COUNCIL AGENDA: 12-07-10
ITEM: 6.1

CITY OF SAN JOSE
CAPITAL OF SILICON VALLEY

Memorandum

TO: HONORABLE MAYOR AND CITY COUNCIL

FROM: Hans F. Larsen
Jennifer A. Maguire

SUBJECT: **CALIFORNIA HIGH SPEED TRAIN PROJECT**

DATE: 11-22-10

Approved

Date 11/23/10

COUNCIL DISTRICT: Citywide

RECOMMENDATION

1. Receive update on the California High-Speed Train (HST) project addressing new information since the September 14, 2010 City Council meeting related to community outreach, project funding, and the draft Cooperation Agreement with the California High-Speed Rail Authority (CHSRA) concerning the visual design elements of the project.

2. Provide staff the following direction related to development of the HST project in San Jose:

   a. Work with CHSRA to prepare Visual Design Guidelines for HSR facilities along the entire HST corridor in San Jose based on alignment options under active consideration by CHSRA and with a goal of completing the Visual Design Guidelines for Council consideration by June 2011 and prior to the release of draft environmental documents for San Jose project segments.

   b. Defer consideration of approving a Cooperative Agreement with CHSRA until after Visual Design Guidelines are completed and considered by the City Council and after draft environmental documents are released for San Jose project segments.

   c. Form two "HST Community Working Groups" to assist CHSRA and City staff in developing Visual Design Guidelines and addressing other project issues, generally covering the greater Downtown area (from Tamien Station north) and the Monterey Highway area (from Tamien Station south).

   d. Proceed with plans to hire a team of consultants with expertise in engineering, urban design, and architecture to serve as advisors to City for the preparation of Visual Design Guidelines, in an amount not to exceed $100,000.

   e. Continue to collaborate with CHSRA on: developing conceptual design plans for HST facilities in the Monterey Highway corridor; identifying environmental issues;

performing community outreach; developing Diridon Station expansion plan; developing an off-site parking plan; and coordinating on land use planning in Diridon Station area.

3. Authorize the Mayor to send a letter to the CHSRA clarifying San Jose's continued interest in CHSRA considering both an aerial and tunnel option for the Downtown San Jose area and with the City's preference being determined only after further information is available on the aerial option regarding visual design and noise impacts, and following release of draft environmental documents for San Jose project segments.

4. In response to the federal allocation of initial HST funding for the Central Valley segment of the project, work with the Metropolitan Transportation Commission and other Bay Area HST stakeholders to advocate for early implementation of a HST connection between the Central Valley and Silicon Valley.

5. Adoption of the following Appropriation Ordinance amendments in the Building and Structure Construction Tax Fund:

   a. Increase the appropriation to the Department of Transportation for High Speed Rail project in the amount of $200,000.

   b. Decrease the Ending Fund Balance by $200,000.

OUTCOME

The recommended actions assist with the further development of the California HST project and help facilitate integration of City goals related to quality design, community involvement, economic development and timely implementation.

BACKGROUND

The CHSRA is developing a project to build an 800-mile HST network serving the state's major population and business centers as shown on Attachment 1. The CHSRA has identified a $43,000,000,000 "priority segment" for the project extending between San Francisco and Anaheim, with major stops in San Jose, Fresno and Los Angeles. The schedule goal for completing this segment is 2020, subject to funding availability. Future segments would include extensions to Sacramento and San Diego.

Project Benefits

The key benefits to San Jose and the entire State of California from the HST project include:

- Provide transportation services to accommodate growth of California's population to 50 million people by 2030, and help facilitate "smart growth" around urban transit hubs.

- Remove millions of passenger trips from congested freeways each year and avoid future overcrowding of California airports by creating high-speed options for long-distance travelers.

- Improve the environment as high-speed trains use 1/3 the energy of air travel and 1/5 the energy of auto travel and thereby eliminating 12 billion pounds of greenhouse gas emissions each year.

- Enhance the economy by generating 600,000 construction-related jobs.

- Significant development opportunities for increased jobs and capital investment in Downtown San Jose through the provision of high quality frequent transportation serving major cities in California and to workforce commuting from northern and central California to jobs in San Jose's driving industries.

Summary of HST Design in San Jose as Proposed by CHSRA

The HST project traverses San Jose for a distance of approximately 20 miles and includes a HST station at the existing Diridon Transit Center in Downtown San Jose. Through the southern area of San Jose, the proposed HST tracks are adjacent to the Caltrain corridor and are "at grade" along Monterey Highway and in the Communications Hill area. In the area between the Tamien Station, north to Taylor Street, the alignment proposed by the CHSRA is elevated with trackway heights up to 60 feet in some areas. Through the Tamien and Gardner areas, the alignment follows the Route 87 and Route 280 corridors. From Route 280 to Taylor Street, the HST trackway is generally adjacent to the existing Caltrain corridor. North of Taylor Street and to the Santa Clara city limits, both an aerial and tunnel alignment are under study.

September 14th City Council Meeting

On September 14, 2010, the City Council accepted a staff report and presentation along with public comment on the HST project and with a particular focus on design options for the Downtown San Jose area. The City Council directed staff to negotiate with the CHSRA to develop and complete a binding agreement that ensures the City have approval authority relative to the project design and construction materials for a proposed aerial alignment in the Downtown San Jose area and to address design and noise impacts in the Monterey Highway area. If an acceptable agreement could not be reached, the City would alternatively send a letter to the CHSRA and seek full study of a Downtown tunnel alignment as part of the full environmental review process.

Recent HST Project Events

Since the September 14th City Council meeting, the following events have occurred regarding the HST project:

- ***Draft Cooperation Agreement*** – City and CHSRA staff completed a draft Cooperation Agreement addressing the visual design of the entire HST project in San Jose. A primary purpose of the agreement is to ensure that an aerial alignment through the Downtown area is designed and constructed to a high quality standard and is subject to City Council input. On October 20th, staff distributed an Information Memo to Council transmitting the draft agreement (see Attachment 2).

- ***CHSRA Response Letter to San Jose Downtown Association*** – On September 29th, the San Jose Downtown Association (SJDA) and a coalition of 11 community leaders provided a letter to the CHSRA requesting answers to questions primarily related to the assessment that the Downtown tunnel option is "unfeasible and impractical" and requesting further study of a tunnel alternative in the environmental report. On November 1st, the CHSRA provided a response letter. (See Attachment 3 for the CHSRA and SJDA letters).

- ***HST Community Meeting*** – On November 4th, the CHSRA and City co-hosted a HST project community meeting at San José City Hall. The meeting included presentations addressing the tunnel and aerial options studied for the Downtown area and an overview of the draft Cooperation Agreement between the City and CHSRA.

- ***Allocation of Federal HST Funds to Central Valley*** – On November 4th, the CHSRA announced that federal officials have required that all federal funding California has received so far for the HST project (primarily Federal Recovery Act funds) must be spent in the Central Valley segment of the project. This means approximately $4,300,000,000 will be invested in the core portion of the HST system in the area between Merced, Fresno and Bakersfield. The intention of the funding is to begin construction on the Central Valley segment by 2012 and with completion by 2017.

ANALYSIS

Proposed New City Strategy and Guiding Principles for HST Project in San Jose

The City's previous actions regarding the HST project have been largely focused on developing the San Jose portion of the project in a manner that supported near-term project funding from the Federal Recovery Act program for the project segment connecting San Francisco to San Jose. This direction was established through the City Council's endorsement (in October 2009) of the San Francisco/Silicon Valley Corridor Investment Strategy for the HST project.

Because these Federal funds are now being allocated to the Central Valley portion of the project, City staff is now recommending a new strategic direction for the project. The proposed guiding principles for the new direction are as follows:

- Facilitate strong San Jose community support for the HST project through the development of a quality design that addresses City interests related to community livability, quality urban design and architecture, and economic development.

- Obtain further information on project design options, particularly the visual and noise impacts of an aerial HST design, before selecting a preferred alternative.

- Improve the readiness of the HST project for implementation in San Jose by completing the environmental clearances and advancing the project design, consistent with San Jose goals.

- Seek near-term new HST funding allocations to support a connection between the Central Valley and Silicon Valley. The prospects for funding are enhanced through a demonstration of community support and project readiness.

Recommended Next Steps

The specific actions recommended by staff to support the City's interests and guiding principles related to the HST project are as follows:

1. ***Prepare Visual Design Guidelines*** – The alignment of HST project in San Jose as recommended by the CHSRA will have a prominent visual presence particularly in the Downtown area where an aerial trackway structure is proposed at heights up to 60 feet and with an overhead electrification system adding another 25 feet in height. A key design issue involves the appearance of the HST facilities and answering the question of "what will it look like?" San Jose has clearly articulated to the CHSRA that the project must meet the City's expectations for an attractive visual design.

   The preparation of Visual Design Guidelines for the entire portion of the project in San Jose for City Council consideration is intended to address project issues related to the mass of structures, column spacing, general architectural concepts, material options, landscaping, lighting and public art opportunities. The Visual Design Guidelines would address the appearance of the HST facilities from various perspectives such as from neighboring properties, sidewalk underpasses, and adjacent freeway corridors. It is proposed that the CHSRA prepare a Visual Design Guidelines report in collaboration with the City by June 2011 for City Council review and approval and integrate certain parts of the report, if applicable, into the Draft EIR for the project.

2. ***Defer Approval of Cooperative Agreement and Expand Current Collaboration on Project Development*** – The draft Cooperation Agreement prepared by City and CHSRA

staff provides a strong framework for collaboration between agencies to support the timely implementation of a quality project. Community feedback on the draft agreement has been positive relative to the significant commitment from the CHSRA on accommodating San Jose's goals for quality design and local approval authority. However, concerns have also been raised that the City should wait until the environmental impacts of the project and visual design concepts are better understood before executing the agreement. Based on this consideration, City and CHSRA staff propose to use the draft agreement as an informal guide for the cooperative development of the project until the draft environmental impact reports are issued for public comment. At such time, executing the agreement will be reconsidered.

Key project development issues that the City and CHSRA will work closely on are: Visual Design Guidelines; conceptual design plans for HST facilities in the Monterey Highway corridor; environmental mitigation measures; community outreach; Diridon Station expansion; developing an off-site parking plan; transit connection to Mineta San Jose International Airport; and coordination of land use planning in Diridon Station area.

3. ***Hire Expert Consultants and assign City Staff to Facilitate City Interests*** – The HST project is a massive and unique type of new infrastructure for San Jose. It is recommended that the City retain a team of expert consultants to help with facilitating the City's interests on HST issues. The City went through the Public Works RFQ selection process and selected the team of Arup, Field Paoli, and Perkins+Will to help in this process. This team of engineers, urban designers, and architects is also currently working on the Diridon Station master plan and it is noted that Arup has significant international experience with developing HST projects. A budget appropriation of $200,000 is recommended to support preparation of HST Visual Design Guidelines with $100,000 for consultants and $100,000 for staff services. It is anticipated that Public Works architectural staff at the Associate or Senior Architect level will be responsible for project management of the visual design guidelines process, the consultant services and expert liaison with CHSRA staff, the community, and other stakeholders.

4. ***Foster Proactive Community Participation*** – The San Jose community has shown a significant interest in the development of the HST project. The Diridon Station Area Good Neighbor Committee has expressed a particularly strong interest in the project and has identified goals and priorities as part of their "Framework for Implementation" (completed on September 7, 2010) that provide thoughtful guidance for developing the HST project. Topic areas include: neighborhood quality of life, creating an attractive experience for pedestrians, bicyclists, and transit riders, pursue world-class structures and art, use durable and graffiti resistant materials, compatibility with future land use plans, and placemaking.

   As part of a comprehensive community outreach program focused on preparing the HST Visual Design Guidelines, it is recommended that two "HST Community Working Groups" be formed to facilitate proactive community feedback on project issues for: 1)

the Downtown San Jose area (Tamien Station to Santa Clara city limits), and 2) the Monterey Corridor area (Tamien Station to Morgan Hill city limits).

Staff proposes to follow up with the Rules and Open Government Committee and the project area Council members with a proposal for the selection of representatives for the HST Community Working Groups and scoping of a work plan. Each of the HST Community Working Groups are proposed to have no more than 10 members and would meet three of four times over a six month period, with a focus on assisting with the preparation of the HST Visual Design Guidelines.

5. ***Clarify City Position with CHSRA on Downtown Area Design Alternatives*** – The City's current policy position regarding HST design options for the Downtown area is to have the CHSRA define and evaluate the "best aerial" and "best tunnel" alternatives. The CHSRA has completed a significant technical evaluation of tunnel options and has concluded a tunnel option with an underground HST station is not viable due to issues of high cost, construction risk, construction impacts, lengthy implementation schedule and impacts to the BART project. The CHSRA assessment of tunnel options is further documented in their letter of November 1, 2010 (included as Attachment 3). The CHSRA has stated since June 2010 that they do not recommend including a tunnel option in the project EIR.

   The "best aerial" option has not been thoroughly evaluated with respect to visual impact and noise. The preparation of HST Visual Design Guidelines is intended to address the visual impact issue, and noise studies for the project are currently being developed as part of the environmental process. It is recommended that the City position be to seek further study of the "best aerial" option before recommending to the CHSRA whether further consideration should be given to the "best tunnel" option. In order to avoid any potential misunderstandings, it is suggested that the Mayor send a letter to the CHSRA clarifying San Jose's continued interest in considering both an aerial and tunnel option for the Downtown San Jose area with the City's preference being determined only after further information is available on the aerial option regarding visual design and noise impacts, and following release of draft environmental documents for San Jose project segments.

6. ***Work with Bay Area HST Stakeholders on Reconsidering Funding Priorities*** – In 2009, City staff worked with officials from the Metropolitan Transportation Commission, San Francisco, Caltrain, and the Santa Clara Valley Transportation Authority (VTA) to develop a HST Investment Strategy to support early implementation of HST service in the San Francisco to San Jose corridor. The City Council adopted a position of support for the Investment Strategy in October 2009. Given the allocation of initial federal HST funds to the Central Valley area, staff recommends the City update its advocacy and partnership efforts to focus on early implementation of HST service connecting the Central Valley with Silicon Valley.

EVALUATION AND FOLLOW-UP

A follow up report to the Rules and Open Government Committee is proposed for December 2010 or January 2011 to address the representation and work plan for the HST Community Working Groups. Staff proposes to provide status reports to the Transportation and Environment Committee on the progress of HST project activities with follow up to the full City Council as needed, including consideration of a draft HST Visual Design Guidelines report by June 2011.

POLICY ALTERNATIVES

Alternative: Council may suggest other policy directions for the HST project and potentially defer Council action on some or all of the staff recommendations.
Pros: Allows City Council flexibility to consider other policy choices and have staff provide a supplemental analysis.
Cons: May delay progress on the San Jose portion of HST project and potentially reduce opportunities for near-term project funding
Reason for not recommending: The staff recommendations are believed to be reflective of a variety of community and stakeholder interests concerning the project, as well as the City's overall best interests related to ensuring a quality project and timely project implementation.

PUBLIC OUTREACH/INTEREST

- ☐ **Criterion 1**: Requires Council action on the use of public funds equal to $1 million or greater. **(Required: Website Posting)**
- ☐ **Criterion 2:** Adoption of a new or revised policy that may have implications for public health, safety, quality of life, or financial/economic vitality of the City. **(Required: E-mail and Website Posting)**
- ☐ **Criterion 3:** Consideration of proposed changes to service delivery, programs, staffing that may have impacts to community services and have been identified by staff, Council or a Community group that requires special outreach. **(Required: E-mail, Website Posting, Community Meetings, Notice in appropriate newspapers)**

This memorandum does not meet any of the above criteria; however, it will be posted on the City's website for the Council agenda. On November 4, 2010, the CHSRA and City co-hosted a community meeting at San Jose City Hall focusing on the Downtown area of the project. The CHSRA has conducted many other HST project meetings in San Jose over the past 18 months.

COORDINATION

This report has been coordinated with the City Attorney's Office.

FISCAL/POLICY ALIGNMENT

The recommended actions that facilitate implementation of the California HST project are consistent with General Plan policy goals related to transportation service, economic development, and environmental sustainability.

COST SUMMARY/IMPLICATIONS

The recommended actions will appropriate a total of $200,000 from the Ending Fund Balance in the Building and Structure Construction Tax Fund in the Traffic Capital Program. $100,000 of this funding will provide for consultant services to serve as advisors to the City and the other $100,000 of funding will provide for staff support for the preparation of the High Speed Rail visual design guidelines.

BUDGET REFERENCE

The table below identifies the fund and appropriation proposed to establish the funding for the cost of the agreement.

Fund #	Appn #	Appn. Name	Total Appn.	Amt. for Agreement	2010-2011 Adopted Capital Budget Page	Last Budget Action (Date, Ord. No.)
429	8999	Ending Fund Balance	$1,810,497	$200,000	N/A	10/19/2010, Ord. No. 28829

CEQA

Not a Project. The recommended actions are either preliminary feasibility studies or are advisory to the CHSRA. The CHSRA is in the process of preparing an EIR for the High-Speed Train project.

/s/

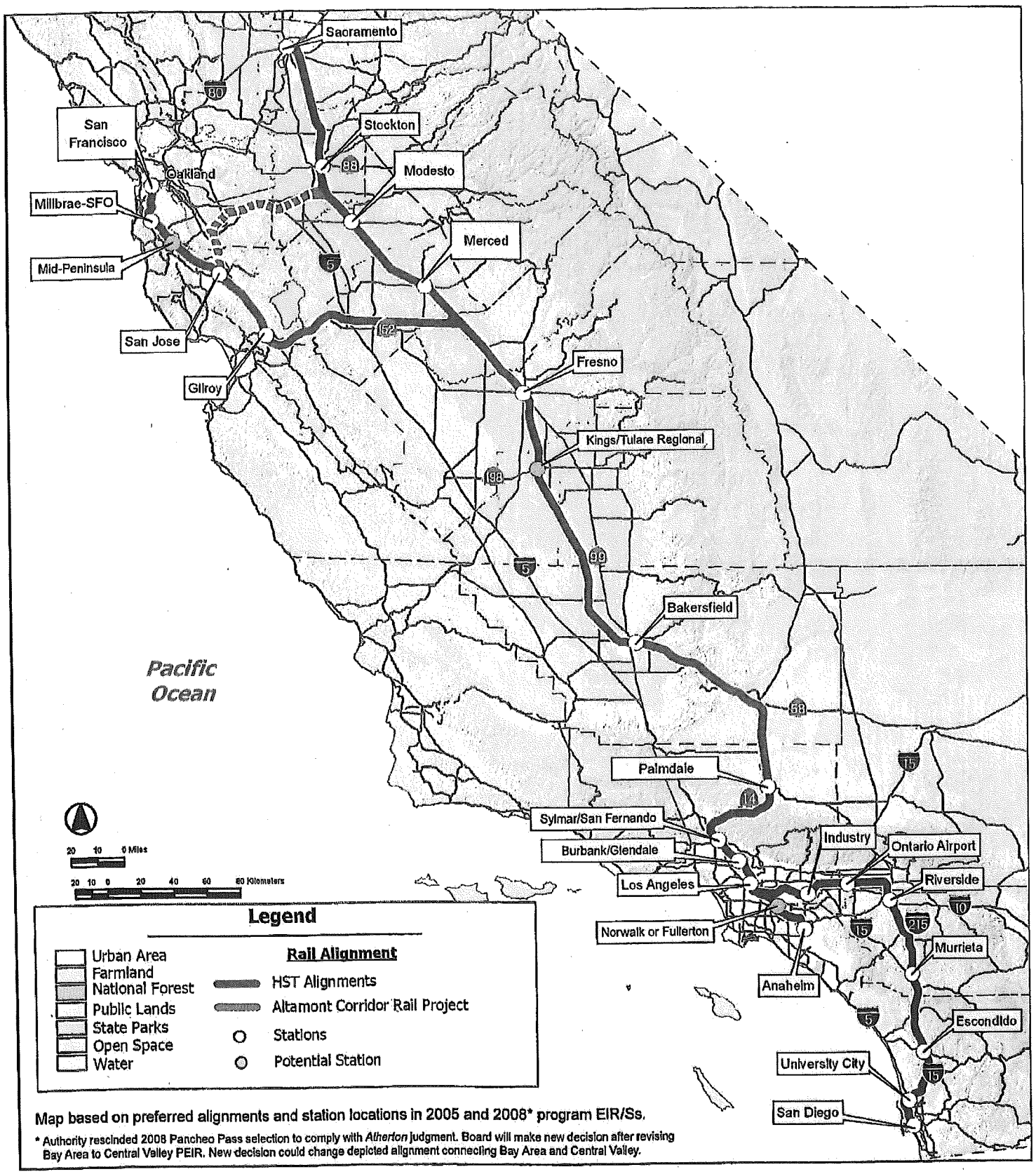
HANS F. LARSEN
Acting Director of Transportation

JENNIFER A. MAGUIRE
Budget Director

For more information, please contact Hans Larsen, Acting Director of Transportation at (408) 975-3835.
Attachments

Attachment 1

California High-Speed Train Map, Statewide Overview



Map based on preferred alignments and station locations in 2005 and 2008* program EIR/Ss.

* Authority rescinded 2008 Pancheo Pass selection to comply with *Atherton* judgment. Board will make new decision after revising Bay Area to Central Valley PEIR. New decision could change depicted alignment connecting Bay Area and Central Valley.

April 2010

Attachment 2
Distributed on:

OCT 2 0 2010
by City Manager's Office

CITY OF SAN JOSE
CAPITAL OF SILICON VALLEY

Memorandum

TO: HONORABLE MAYOR AND CITY COUNCIL

FROM: Hans F. Larsen

SUBJECT: CALIFORNIA HIGH-SPEED TRAIN PROJECT – DRAFT COOPERATION AGREEMENT

DATE: 10-19-10

Approved

Date 10/20/10

INFORMATION

The purpose of this memorandum is to share with the City Council, and to make available for public review, the draft Cooperation Agreement developed with the California High Speed Rail Authority (CHSRA) addressing the visual design of the High Speed Train (HST) project in San Jose and with a particular focus on a proposed aerial alignment in the Downtown San Jose area. A copy of the draft agreement is attached.

The agreement was developed based on City Council direction provided on September 14, 2010 that sought to: complete a binding agreement that ensures the City have approval authority relative to the project design and construction materials for a proposed aerial alignment in the Downtown San Jose area; and to address design and noise impacts in the Monterey Highway area. The proposed language for the agreement was developed and negotiated over the past month and included direct participation from City Attorney Rick Doyle and CHSRA Chief Executive Officer Roelof van Ark.

Guiding Principles

The principles and shared objectives that guided development of the agreement include the following:

- Project implementation is based on mutual collaboration and each party acting reasonably.
- The primary City objective is to ensure the visual elements of the project will be designed and constructed to a high quality standard and is subject to City Council approval. The CHSRA and City will jointly conduct community outreach to solicit input on design issues and preferences.
- The primary CHSRA objective is that the implementation process allows for efficient project delivery and certainty in the resolution of issues involving a progressive process of meetings, mediation, and binding decision making (if necessary). Through State statutes,

the CHSRA has the responsibility to plan, design and construct the HST project and they need to retain certainty in their ability to effectively deliver the project. The consideration of a local agency having "veto authority" over implementation of the project is not acceptable to the CHSRA.

The draft agreement discloses the physical presence the proposed HST project will have in San Jose. The alignment traverses San Jose for a distance of approximately 20 miles. For a three-mile segment in the Downtown San Jose area, an elevated trackway is proposed with heights in the range of 50 to 60 feet, and includes an elevated Diridon Station with an elevated station canopy. In addition, the agreement acknowledges Downtown San Jose as the "creative and cultural center of Silicon Valley" and the City's standards for high quality architecture, public art, and urban design as reflected in recent public projects like the San Jose City Hall and the Mineta San Jose International Airport.

It is staff's opinion that the draft agreement provides a strong and binding commitment from the CHSRA that the HST project in San Jose will be designed and implemented in manner that meets the City's goals for community compatibility and quality visual design.

CHSRA Commitments Ensuring a Quality Design Acceptable to City

The draft agreement specifies a sequential process for developing and mutually approving a high quality visual design for the HST project. The implementation steps are as follows:

- **Visual Design Guidelines Incorporated into Final Environmental Document** – The CHSRA will prepare Visual Design Guidelines (VDG) for the entire 20-mile San Jose project area and incorporate them into the final environmental documents for the HST project. The Visual Design Guidelines will address concepts and options for structures, column spacing, general architecture, materials, landscaping, lighting, and public art opportunity areas. The visual Design Guidelines are to be approved by the City Council and CHSRA Board. Based on the planned implementation schedule for HST project, the Visual Design Guidelines would be completed in 2011.

- **Architectural Concept Plans** –The CHSRA will prepare final Architectural Concept Plans for the selected construction segments of the project. These are generally regarded as 30% drawings and will include renderings of the final visual appearance for key features of the project, including the selection of construction materials and finishes. The Architectural Concept Plans are to be approved by the City Council.

- **Visual Design Changes Require City Approval** – The CHSRA will complete the final design plans and build the project in accordance with the approved Visual Design Guidelines and Architectural Concept Plan. Any changes that affect the visual design must be approved by the City.

- **Aesthetic Design Review Panel** – The City and CHSRA will form an Aesthetic Design Review Panel (ADRP) to provide professional advisory services for development of Visual Design Guidelines, Architectural Concept Plans, and as needed to review potential changes during final design and construction. The three-member ADRP will include one City selected member, one CHSRA selected member, and one mutually selected member.

- **Dispute Resolution Process** – If the City Council and CHSRA Board do not mutually approve the Visual Design Guidelines or Architectural Concept Plans, the City Mayor and CHSRA Board Chair and with support of their staff and the ADRP, shall work to mediate differences. If no agreement is reached, the ADRP will act as a binding decision maker to resolve differences.

City Commitments to CHSRA

As a demonstration of the mutual partnership in supporting a quality HST project in San Jose in a cost and schedule efficient manner, San Jose's commitments to the CHSRA include the following: an intention to support an elevated HST alignment in the Downtown area having a quality visual design, support for reducing the width of Monterey Highway in south San Jose, facilitating development of an integrated Diridon Station, and consultation with CHSRA on land use in the Diridon Station area.

Next Steps

On October 13, 2010, the Rules and Open Government Committee approved scheduling City Council actions on the HST project for November 16, 2010. Prior to the Council meeting, the CHSRA is planning to complete a written response to the September 29, 2010 letter from the San Jose Downtown Association and co-signed by eleven community leaders requesting answers to questions primarily related to the CHSRA's assessment that a tunnel option in the Downtown area is "unfeasible and impractical". Also, a HST community meeting has been scheduled for: Thursday, November 4, 2010, 6:00 p.m. to 8:00 p.m., in the San Jose City Hall Wing Conference Room.

The next report to the CHSRA Board addressing Downtown San Jose design issues is proposed to occur on December 2, 2010.

/s/
HANS F. LARSEN
Acting Director of Transportation

For more information, please contact Hans Larsen at (408) 535-3835.

Attachment

MASTER COOPERATION AGREEMENT
BETWEEN
THE CITY OF SAN JOSE
AND THE CALIFORNIA HIGH SPEED RAIL AUTHORITY
RELATING TO THE PROPOSED HIGH SPEED TRAIN PROJECT
THROUGH SAN JOSE

THIS AGREEMENT ("Agreement") dated _____, 2010, for purposes of reference, is made and entered into by and between the CALIFORNIA HIGH SPEED RAIL AUTHORITY, a state agency ("CHSRA"), and the CITY OF SAN JOSE, a municipal corporation of the State of California ("City"). Hereinafter, CHSRA and City may be individually referred to as "Party" or collectively referred to as "Parties".

RECITALS

A. The proposed California High Speed Rail project is an 800-mile High Speed Train (HST) system connecting the major metropolitan areas of the State of California. California voters passed Proposition 1A in 2008 to approve $9.95 billion in bonds to support development of a HST system in California. The CHSRA is the state entity established in 1996 responsible for planning, constructing, and operating the 800 mile HST system and has authority under California Public Utilities Code Section 185036 to enter into cooperative agreements with local governments.

B. CHSRA in partnership with the Federal Railroad Administration ("FRA") has completed and certified a Revised Program EIR/EIS for the proposed HST system, and has identified a preferred network alternative including an alignment and station in San José for further study in project EIR/EISs. The HST project EIR/EISs include study of proposed HST facilities to traverse the City of San José for a distance of approximately 20 miles and a HST station at the existing Diridon Transit Center located in Downtown San José.

C. City has long publicly supported the implementation of a HST system to connect the major metropolitan areas of California and directly serve San José with a station at Diridon Station in Downtown San José via the Pacheco Pass. City and Silicon Valley companies have a strong interest in the completion of the HST system to provide a fast and frequent transportation service within California. The CHSRA has conducted extensive community outreach in the San José area to date. The input received has shaped CHSRA's evolving plans so as to accommodate public concerns.

D. Downtown San José is considered the creative and cultural center of Silicon Valley and the City has sought to create a world-class visual design environment for the Downtown San José area through a combination of high quality architecture, public art and urban design. Examples of recent projects that represent the San José's

standards for quality architecture include the San José City Hall and the Norman Y. Mineta San José International Airport.

E. City intends to support a proposed HST alignment that includes an elevated HST system through the Downtown San José area, provided that the visual design of the proposed elevated HST facilities be of high quality and consistent with visual design guidelines and architectural concept plans as set forth in this Agreement. CHSRA recognizes the importance of City support for CHSRA's evaluation and ultimate selection of an alignment through San José and desires to work with the City to gain City support for an elevated HST system through the Downtown San José area.

F. CHSRA is evaluating an alignment alternative for the HST project that includes an elevated profile with trackway elevations in the range of about 50 to 60 feet for approximately a 3-mile segment in the Downtown San José area, including an elevated Diridon Station with a station canopy. The height of such an alignment through Downtown San José would have a visual presence in the skyline for Downtown San José and adjacent neighborhoods, if it were to be selected and approved by the CHSRA. The City desires an architectural design treatment for such facilities that takes a number of factors into consideration, such as public art, landscaping, lighting, materials options, design features, and others, in order to address concerns of the City and residents.

G. CHSRA is committed to providing a high quality visual design solution and agrees that it is in the public interest for the CHSRA to design and construct HST facilities in San José in a mutually beneficial manner based upon shared objectives, taking into account the City's aesthetic preferences and the Authority's obligations and constraints related to planning, mitigation, engineering, performance, funding and operational requirements.

H. CHSRA and the City acknowledge that collaboration, compromise, and good faith on the part of all parties are necessary for the process set forth in this Agreement to work to the satisfaction of both parties.

I. City acknowledges that CHSRA, in entering into this Agreement, is not admitting to the existence of significant impacts or the need for any mitigation resulting from the future selection of HST facility locations, and the construction and operation of a HST system in San José, but is doing so in the spirit of cooperation with the City and its residents.

J. City and CHSRA, in recognition of the mutual benefit to be derived from the proposed HST system through San José, desire to enter into a binding written agreement that provides for cooperation in aesthetic design of the elevated HST system in San José and in land use planning for the area around Diridon Station. This Cooperation Agreement is in keeping with the spirit of that separate

Memorandum of Understanding among multiple parties (including the Parties hereto, and the Peninsula Joint Powers Board and the Valley Transportation Authority) related to planning for Diridon Station expansion.

Now, therefore, the parties agree as follows:

1. PROJECT DESCRIPTION AND BACKGROUND

A. In 2009, the CHSRA issued "Notices of Preparation" for project-level EIR/EISs and preliminary engineering for the HST project, and solicited input on HST alternatives and issues for study in the project EIR/EISs. For San José, two separated but coordinated project EIR/EISs were initiated covering the sections from (i) San Francisco to San José Diridon Station and (ii) San José Diridon Station to Merced. Draft environmental impact reports are currently being prepared for both these HST sections, which reports and related actions may proceed on different schedules as the Authority determines.

B. CHSRA currently is considering the following alignments for analysis in project EIR/EISs consistent with the preferred network alternative identified for San José in Authority Resolution #HSRA 11-11: (i) at-grade next to Caltrain corridor in the Monterey Highway and Communications Hills areas; (ii) aerial along the 87/280 corridor in the Tamien and Gardner areas; (iii) aerial in or near the Caltrain corridor in the Downtown to Taylor area; and (iv) aerial or tunnel near the Caltrain corridor north of Taylor to the Santa Clara city limits. CHSRA staff has evaluated and is evaluating other alignments and no final decisions on HST alignments and stations have been made; such decisions will be made soon after CHSRA certifies associated environmental impact reports.

C. In June 2010, the CHSRA staff released its Preliminary Alternatives Analysis Report addressing the Downtown San José alignment and recommended withdrawing the tunnel option from further study and assessing that option as impractical based on construction risks, poor soil, high groundwater, extensive surface disruption, lengthy construction schedule, very high construction cost, and impacts to the planned BART project.

D. On August 31, 2010, City staff recommended to the City Council in a memorandum that an aerial alignment (rather than a tunnel alignment) serves San José's best overall interests, provided the project has a high quality visual design and the Parties enter into a cooperative agreement approved by the City Council that addresses the City's concerns regarding noise and visual presence. City Council directed City staff at its meeting on September 14, 2010 to negotiate with CHSRA to develop and complete a binding cooperative agreement for Council consideration.

E. For Downtown San José, the Preliminary Alternatives Analysis Report recommends study of an aerial alignment that consists of an elevated trackway approximately 50 to 60 feet high, with an overhead electrification system adding another 25 feet in height, mostly within existing transportation corridors along the Caltrain and Route 87/280 interchange area.

F. City would support the recommended aerial alignment for Downtown San José provided that the Parties enter into this Agreement.

2. COOPERATION

A. The Parties agree to continue to work cooperatively throughout the preparation of CHSRA's Project Level EIR/EIS for the San Francisco to San José and San José to Merced segments. In preparing its Project Level EIR/EIS, CHSRA will take into account and coordinate with, to the extent it is appropriate to do so, the other technical studies and proposed improvements which have been prepared or will be prepared by City as part of the Diridon Station Area Plan.

B. The Parties recognize that realistic planning for the future HST system in San José will best occur through cooperation and coordination among all of the agencies having responsibilities to address public transportation needs in San José, including the Peninsula Joint Powers Board and the Valley Transportation Authority. Staff of City and CHSRA agree to cooperate fully and work collaboratively to freely share information, as appropriate, on the planning and design of the proposed HST facilities in San José on a timely basis to ensure opportunities for meaningful City and neighborhood review and comment.

C. CHSRA and City shall jointly conduct a public outreach process with San José community and key stakeholders to identify values, issues, opportunities and general design preferences. City shall take the lead in identifying appropriate community venues and stakeholders. Each Party agrees to encourage public awareness and involvement in the environmental process and design of the proposed HST system in San José. The outreach shall seek to obtain community input during development of the visual design guidelines and architectural plans for the proposed HST facilities in San José.

D. The Parties will meet within thirty (30) days of the full execution of this Agreement to discuss the timing and implementation of this Agreement.

E. Each Party agrees to cooperate and coordinate with the other Party, its staff, contractors, consultants, and vendors providing services required under this

Agreement to fulfill the terms, conditions, and obligations under this Agreement.

F. The Parties agree to work diligently together and in good faith, using their best efforts, to resolve any unforeseen issues and disputes arising out of the performance of this Agreement.

G. This Agreement will set the framework for potential subsequent cooperative agreements as the proposed HST project continues through the planning, design, and construction phases to address specific issues that may arise at a later date.

3. CHSRA COMMITMENTS

A. CHSRA reaffirms its commitment to work cooperatively with City in the planning, construction, and operation of the proposed HST system in San José. CHSRA agrees to seek City review and comment on any policies, guidelines, concepts, or designs relating to the proposed HST system in San José.

B. VISUAL DESIGN GUIDELINES

CHSRA staff will work with City staff and shall prepare visual design guidelines for the entire proposed HST system in San José. The guidelines shall address HST structures, such as aerial viaducts and bridges, including such topics as the mass of structures, column spacing, general architectural concepts, material options, landscaping concepts, lighting, and public art opportunity areas. The guidelines must respect that some functional and engineering elements of the HST system (such as the overhead catenary system, for example) must be consistent across the state for the system to work properly, safely and consistently. In addition, the Parties may consult and seek input from the Aesthetic Design Review Panel ("ADRP") described in paragraph 5.A. below in developing the visual design guidelines. The guidelines will be used to facilitate the architectural plan and final design for the HST project in San José. The guidelines will be presented to the City Council and the CHSRA Board for their respective reasonable approval at least 60 days before a Final Project EIR/EIS for the San Francisco to San José segment or the San José to Merced segment is presented to the CHSRA Board for certification, whichever is earlier. If within 30 days the City Council and the CHSRA Board do not approve the guidelines, then the guidelines will be referred to the ADRP, and within 15 days the ADRP shall provide to the CHSRA and the City a written recommendation resolving the outstanding issues and suggesting appropriate reasonable final guidelines. Upon receipt of the ADRP recommendation, the City Mayor and the CHSRA Board Chair, supported by their respective staff, shall continue to work over

the subsequent 15 days to develop final guidelines supported by both Parties; each Party agrees to be reasonable in pursuing concurrence on the guidelines. Revised guidelines, if necessary, shall be presented to the City Council and CHSRA Board for their respective reasonable approval within 60 days of the first presentation. If the City Council and CHSRA Board have not approved a mutually-acceptable set of design guidelines by the time a Final EIR/EIS is presented to the CHSRA Board for certification, the CHSRA may proceed with EIR certification and related decisions, and the Parties will continue to seek agreement on the guidelines. If after consideration of the ADRP recommendation and after further refinement by the work of the CHSRA Board Chair and the City Mayor, assisted by their respective staff, the final guidelines are not accepted by the City Council or the CHSRA Board, the parties will refer any outstanding issues not resolved by the refined guidelines to the ADRP, and within 15 days the ADRP will provide a final written recommendation to resolve the outstanding issues and to incorporate the resolution into the guidelines. The final recommendation of the ADRP shall stand and the City Council and CHSRA Board shall be deemed to accept the final ADRP-recommended guidelines, unless either the Parties subsequently, by mutual written agreement, modify the approved guidelines with the concurrence of their respective City Council and Board. Nothing in this paragraph shall be construed as limiting the CHSRA's discretion in any manner to evaluate potential environmental effects of HST facilities in San José, to develop any required associated mitigation measures or to consider and approve project alternatives, all as required by CEQA.

C. ARCHITECTURAL CONCEPT PLANS

After the visual design guidelines have been finalized as discussed above, CHSRA staff shall prepare Architectural Concept Plans (as defined below) ("ACP") for the HST facilities in San José consistent with the approved visual design guidelines pursuant to Section 3.B. CHSRA need not prepare ACPs for all HST facilities in San José at once, but rather may prepare them in groups and staggered in time. In preparing the ACPs, the CHSRA staff shall work with City staff, and the Parties may consult the ADRP and seek opinion and input to assist the Parties in identifying design solutions consistent with the visual design guidelines and the mutual objectives of the Parties. The approved ACPs shall be the basis for more detailed engineering drawings and ultimately construction documents for the HST system in San José. The CHSRA will work with the City to set forth a review schedule. The ACPs will be presented to the City Council and the CHSRA Chief Executive Officer ("CEO") for their respective reasonable approval at least 60 days before the Authority expects to make a final decision on such plans. If within 30 days either Party does not approve the ACPs as presented, the City Mayor and the CHSRA CEO, supported by their respective staff, shall continue to work over the subsequent 30 days to develop ACPs supported by both Parties; each

Party agrees to be reasonable in pursuing concurrence on the ACPs. During this 30-day period, the Parties also shall obtain a written recommendation from the ADRP regarding an appropriate set of ACPs that are reasonable and are consistent with the final design guidelines; such recommendation shall include, if possible, ways to segregate in the ACPs aesthetic items from basic system elements necessary to meet performance and operational needs of the HST system, such that the Parties could continue to work toward agreement and refinement of aesthetic items, while not delaying the Authority in moving forward with design and contracting. Revised ACPs, if necessary, shall be presented to the City Council and CHSRA CEO for their respective reasonable approval within 60 days of the first presentation. If the City Council and CHSRA CEO have not approved a mutually-acceptable set of ACPs within 60 days of first presentation, the parties will refer any remaining issues not resolved by the revised ACPs to the ADRP, and within 15 days the ADRP will provide a final written recommendation to resolve the outstanding issues and to incorporate the resolution in the revised ACPs. The recommendation of the ADRP shall stand, and the City Council and CHSRA CEO agree to accept the final ADRP-recommended ACPs, unless either the Parties subsequently, by mutual written agreement, modify the approved ACPs. As used in this Agreement, "Architectural Concept Plans" shall mean industry standard architectural renderings sufficient to identify general size and scale, elevation, shape and approximate color, finish treatment, and aesthetic aspects of the Authority's chosen construction materials to the extent such materials are typically addressed as an industry standard in design documents such as the ACPs; these are generally regarded in the industry as thirty percent (30%) drawings.

D. FINAL DESIGN REVIEW

CHSRA agrees that all project final architectural plans, engineering design plans and construction drawings and documents shall be consistent with the approved ACPs set forth in Section 3.C. above. CHSRA staff shall work with City staff to set forth a review schedule. CHSRA staff shall provide City staff the opportunity for review of design and construction drawings and documents to verify that they are consistent with the approved ACPs. City staff has the authority to review for consistency; City Council review or opinion is not required. If the Parties are in disagreement at any time regarding consistency of final plans, drawings and documents with the ACPs, the Parties immediately shall seek a written determination from the ADRP, which determination shall be presented to the CHSRA CEO and the City staff. If any issues remain unresolved between the CHSRA CEO and the City staff, the ADRP determination shall be accepted as to those issues.

E. CHSRA agrees to construct the proposed HST facilities in San José consistent with the approved final project architectural plans, engineering

design plans, and construction drawings and documents discussed in this Section 3. CHSRA will consult City before approving any material changes or modifications during project construction that alter aesthetic or visual elements of the approved project in San José, including but not limited to, changes to the mass of structures, column spacing, colors, textures, aesthetic aspects of the Authority's chosen construction materials, and lighting. Any material change to aesthetic or visual elements of HST facilities during the construction process, except changes necessary to meet HST operational or engineering requirements, must be mutually approved by the Parties, unless the CHSRA and the City agree in writing otherwise with regard to any specific proposed changes as appropriate to achieve the purposes of this Agreement. Any dispute between the Parties regarding whether an aesthetic change is consistent with the approved ACPs shall be referred to the ADRP for a reasonable written determination from the ADRP, which the Parties shall accept.

4. CITY COMMITMENTS

A. The proposed HST system through San José may include the reduction in the width of a portion of Monterey Highway in order to accommodate the proposed HST project and City has been working with the State of California on the relinquishment of Monterey Highway that will assist CHSRA in the planning and construction of the project through San José. City will continue to work with the CHSRA towards the implementation of HST through San José, including assisting in the possible reduction of lanes for a portion of Monterey Highway.

B. City has received funding from the Metropolitan Transportation Commission and Santa Clara Valley Transportation Authority to develop a Diridon Station Area Plan. City will continue to lead efforts to develop an integrated Diridon Multi-Modal Transit facility as part of the Diridon Station Area Plan.

C. City affirms its intent to work as cooperatively as possible with CHSRA to expedite all City review of the draft visual design guidelines and architectural plans in a timely manner.

D. City affirms its commitment to work cooperatively with CHSRA in the development and preparation of the Diridon Station Area Plan and any other plans or plan amendments related to land use planning near proposed HST facilities in the San José Downtown area. City agrees to seek CHSRA review and comment on (1) any policies, guidelines, concepts, or land use plans or plan amendments related to land use planning near the proposed HST system in San Jose, and (2) all phases of the development and adoption of the Diridon Station Area Plan.

E. Nothing in this Agreement is intended to obligate the City to provide funding from City revenues for any activity other than staff participation under this Agreement and one half of any costs for the participation of the third member of the ADRP as provided in Section 5.A. below.

5. MUTUAL COMMITMENTS

A. The Parties will form the Aesthetic Design Review Panel within ninety (90) days of full execution of this Agreement to provide assistance in the implementation of this Agreement. The ADRP shall consist of the following: (1) one person with appropriate architecture, design, engineering or planning experience designated by the City, (2) one person with appropriate architecture, design, engineering or planning experience designated by the CHSRA CEO, and (3) one person selected together by the CHSRA CEO and the City Mayor from a candidate list compiled jointly by the City's representative on the ADRP and the CHSRA's representative on the panel. The ADRP may function without the mutually selected third member, but such member must be designated before the ADRP may make any written recommendation or determination under the procedures specified in this Agreement. Each Party shall bear the cost of its own representative. The Parties shall attempt to secure the services of the third panelist free of charge to either Party; if this is not possible the Parties shall share the cost of the third representative.

B. The Parties agree that, following the execution of this Agreement, they will convene to discuss the process by which CHSRA will develop the visual design guidelines and ACPs discussed herein.

C. Each Party, and by extension the ADRP, agrees to act reasonably in the implementation of this Agreement. Each Party agrees that it will not unreasonably withhold approval of the visual design guidelines, ACP, or final architectural/engineering/construction documents or plans. The Parties agree that the interpretation of reasonable action under this Agreement shall take into account that the City desires high quality visual design for the elevated HST facilities in San José, and that HST facilities must be fit for the purpose for which they are designed as measured by international standards of practicability in the high-speed rail industry, must meet HST engineering, and operational needs, must be consistent with the Authority's legal obligations and limitations, including Proposition 1A and CEQA, and, to take reasonable cost into consideration.

6. GENERAL PROVISIONS

A. No Delegation. This Agreement is not intended to constitute a delegation by one party to the other of any of that party's responsibilities, duties, or obligations

arising from any applicable law, including, without limitation, the National Environmental Policy Act, the California Environmental Quality Act, the California High-Speed Rail Act, or the Safe, Reliable High-Speed Passenger Train Bond Act for the 21st Century. Under no circumstances shall City or CHSRA have authority or power to pledge the credit of the other public entity to this Agreement or incur obligation(s) in the name of the other public entity.

B. No Third Party Beneficiary. This Agreement shall not be construed or deemed to be an Agreement for the benefit of any third party or parties, and no third party or parties shall have any claim or right of action hereunder for any causes whatsoever.

C. Term of Agreement. This Agreement shall become effective upon full execution of the Agreement and shall remain in effect through December 31, 2020, unless otherwise mutually altered by the Parties in writing.

D. Parties' Representatives. The Chief Executive Officer of CHSRA or his/her designee is hereby made the representative of CHSRA for all purposes under this Agreement, unless CHSRA Board approval or other action is required. The Director of the Department of Transportation for City or the Director's designee is hereby made the representative of City for all purposes under this Agreement.

E. Indemnification. Pursuant to California Government Code Section 895.4, each PARTY hereto shall fully defend, indemnify and hold harmless the other PARTY, its officers, governing body, employees, assigns and agents, from liability imposed for injury (as defined by Government Code section 810.8) occurring by reason of anything done or omitted to be done by any of the parties under or in connection with any work, authority or jurisdiction allegedly delegated to the parties under this Agreement. No officer of employee thereof is responsible for any damage or liability occurring by reason of anything done or omitted to be done by the parties under or in connection with any work, authority or jurisdiction delegated to the parties under this Agreement. Each party is responsible for its own conduct and actions. Although this agreement does not create any agency relationship as between the parties, does not in any way constitute an authorization by any party to any other party that work be done, and does not constitute a delegation by any party to any other party of any authority or jurisdiction, in the even suit is brought against one party (the "first party") based on the alleged acts or omissions of another party (the "second party"), the second party shall indemnify and hold harmless the first party from any liability for such alleged acts or omissions.

F. No Waiver. The failure of either Party to insist upon the strict performance of any of the terms, covenant and conditions of this Agreement shall not be deemed a waiver of any right or remedy that either Party may have, and shall not be deemed a waiver of their right to require strict performance of all of the terms,

covenants, and conditions thereafter.

G. Notice. Any notice required to be given by either Party, or which either party may wish to give, shall be in writing and served either by personal delivery or sent by certified or registered mail, postage prepaid, addressed as follows:

To CHSRA: California High Speed Rail Authority
Roelof van Ark, Chief Executive Officer
925 L Street, Suite 1425
Sacramento, CA 95814

With a copy to: Office of the Attorney General
1300 I Street, 15th Floor
Sacramento, CA 94814
Attn: James Andrew

To CITY: City of San José
Hans Larsen, Acting Director
Department of Transportation
200 E. Santa Clara Street, 8th Floor Tower
San Jose, CA 95113-1905

With a copy to: City Attorney
City of San José, Office of City Attorney
200 E. Santa Clara Street, 16th Floor Tower
San Jose, CA 95113

Notice shall be deemed effective on the date personally delivered or, if mailed, three (3) days after deposit in the United States mail.

H. Dispute Resolution. If a question arises regarding interpretation of this Agreement or its performance, or the alleged failure of a Party to perform, the Party raising the question or making the allegation shall give written notice thereof to the other Party. The Parties shall promptly meet in an effort to resolve the issues raised. If the Parties fail to resolve the issues raised, alternative forms of dispute resolution, including mediation, may be pursued by mutual agreement. It is the intent of the Parties to the extent possible that litigation be avoided as a method of dispute resolution.

I. Mutual Remedies. It is agreed that in the event of litigation the Parties agree to undertake settlement efforts in good faith and seek a speedy resolution of any claim of breach of this Agreement by any Party. Either party may seek any remedy at law or in equity to the extent available under applicable law.

J. Governing Law. This Agreement shall be construed and its performance

enforced under California law.

K. Entire Agreement. This Agreement constitutes the entire Agreement between the Parties pertaining to the subject matter contained therein and supersedes all prior or contemporaneous agreements, representations and understandings of the Parties relative thereto.

L. Amendments. Future amendments to this Agreement shall be processed by mutual written agreement of the Parties. Unless otherwise provided herein, any amendments to this Agreement must be approved by City's City Council and by the CHSRA. Whenever possible, notice to amend this Agreement shall be provided ninety (90) calendar days prior to the desired effective date of such amendment.

M. Warranty of Authority to Execute Agreement. Each Party to this Agreement represents and warrants that each person whose signature appears hereon has been duly authorized and has the full authority to execute this Agreement on behalf of the entity that is a Party to this Agreement.

N. Severability. If any term, covenant, condition or provision of this Agreement, or the application thereof to any person or circumstance, shall to any extent be held by a court of competent jurisdiction to be invalid, void or unenforceable, the remainder of the terms, covenants, conditions and provisions of this Agreement, or the application thereof to any person or circumstance, shall remain in full force and effect and shall in no way be affected, impaired or invalidated thereby.

O. Counterparts. This Agreement may be signed in multiple counterparts, each of which will be considered an original, and all of which will be considered one and the same document.

P. Appropriation. CHSRA obligations under this Agreement shall be valid and enforceable only to the extent sufficient funds are appropriated by the Legislature and made available to the CHSRA in the Budget Act of the appropriate fiscal year for the purposes of this program. In addition, CHSRA obligations under this agreement are subject to any additional limitations, requirements or conditions enacted by the Legislature that affect the provisions or terms of this agreement, or the funding of activities pursuant to this agreement in any manner.

WITNESS THE EXECUTION HEREOF the day and year first hereinabove set forth.

"CITY"
City of San José
a municipal corporation

By:_____
Lee Price, MMC
City Clerk

APPROVED AS TO FORM:

By:_____
Johnny V. Phan
Deputy City Attorney

"CHSRA"
California High Speed Rail Authority

By:_____

Date: _____

APPROVED AS TO FORM:

By:_____
Counsel

Date: _____

CALIFORNIA
High-Speed Rail Authority

11-1-10

Art Bernstein, President
San Jose Downtown Association
28 N. First Street, Suite 1000
San Jose, CA 96113

Dear Mr. Bernstein:

The California High Speed Rail Authority (Authority) welcomes and will continue to promote public and agency dialogue and collaboration as we develop the California High Speed Train (HST) system. Thank you for your September 29, 2010 letter submitted on behalf of a number of organizations and for your continued interest in San Jose's HST station and alignment options.

Your letter generally requests the Authority to include an underground station option/ alternative in its pending project Environmental Impact Reports/Environmental Impact Statement (EIR/EIS) for the San Francisco to San Jose and the San Jose to Merced section. This response letter and its attachment review the major themes contained in your letter and provide an overview of the Authority's evaluation of the tunnel and other alternatives in the San Jose station area.

The Authority and its federal partner, the Federal Railroad Administration (FRA), are completing an Alternatives Analysis (AA) for each section of the proposed California HST system before proceeding with the preparation of draft EIR/EISs. This AA process is designed to identify potential alignment alternatives and station options for an initial evaluation, and to receive public and agency input, before recommending the alternatives and stations to be studied in the project EIR/EIS. This process is consistent with federal and state law governing the preparation of EIR/EIS documents, as discussed in more detail in the attachment to this letter. Importantly, the AA process is part of the EIR/EIS process. No decisions regarding alternatives are final until the Authority Board and FRA make decisions at the end of that EIR/EIS process.

The Authority staff and FRA completed a Preliminary AA (PAA) for the San Jose to Merced Section that includes descriptions and evaluations of alignment and station alternatives considered. The PAA for the San Jose to Merced Section was presented to the Authority Board on June 3, 2010 for information and posted on the Authority's web site that day (at http://www.cahighspeedrail.ca.gov/Lib_San_Jose_Merced.aspx). The Authority received comments requesting examination of tunnel options in downtown San Jose early during the EIR/EIS scoping process, at subsequent public and stakeholder meetings in San Jose, and in written correspondence from neighborhoods and the City of San Jose. In response, the Authority staff and consultants studied several tunnel alternatives. Some were found to be highly impractical and not constructable (e.g., the "5100m" and

"Thread the Needle" alternatives), so did not warrant additional analysis, while two tunnel alternatives were evaluated in detail. These alignments were developed to nearly a 15% level of engineering, which is beyond what is typically done for a preliminary review of potential alternatives.

First, a deep mined station was evaluated and staff found the station to be not reasonable or realistic. Following this analysis, the City of San Jose and downtown neighborhoods requested a review of a shallower cut-and-cover option with the proposed BART station 140 feet deep below the HST station. This alternative was also developed for preliminary evaluation in the AA process. The shallow tunnel was located to accommodate construction of a cut and cover station box and station track work, minimize impacts to existing development in downtown San Jose, avoid to the extent possible conflicts with I-280 foundations, and avoid impacts to residential areas south of I-280. Additionally, five above-ground alignment options were evaluated in the PAA, also in response to input from the City of San Jose and communities near the downtown station.

The evaluation of the below ground alternatives is documented in Chapter 4 of the PAA, and more detail regarding the downtown tunnel alternatives is provided in Appendix C – the "Downtown San Jose Tunnel Alternatives." With regard to the tunnel options, the PAA recognized that local agencies, community groups and the public all proposed underground options for the San Jose Diridon Station and Approach, and that the City of San Jose would prefer to continue investigation of the most viable tunnel concept. After considerable study of both deep mined stations and shallower cut-and-cover options, however, the preliminary alternatives analysis indicated that underground options are <u>not</u> practicable due to unsafe mining conditions (poor soils combined with high groundwater), construction schedule, potential for settlement, extensive surface disruption and very high construction cost and should be eliminated from further evaluation. In the case of the shallow tunnel option, the proposed BART station and extensions north to Santa Clara and east to downtown would also have to be redesigned and placed much lower in the existing poor ground conditions. Locating the HST Station above the existing Diridon Station platforms would maximize connectivity and development potential in the station area. The AA Report also recommends no further study of the program alignment through the Greater Gardner community because of potential impacts to the neighborhoods including community cohesion, noise/vibration, visual, impacts on Fuller Park and displacement of a nonprofit (house of worship). Instead further study is recommended of an alternative (SR-87/I-280) that would minimize impacts by utilizing the existing freeway corridors for much of the approach to the station and would move the alignment away from the Greater Gardner neighborhood. More detailed reasons for these recommendations are contained in Chapter 4 of the PAA and are included in the attachment.

The severe construction issues associated with tunneling in this area (e.g., possible groundwater infiltration, potential settlement over tunnel potion, closure of cross streets, channelization of Los Gatos Creek during construction, reduced parking areas for sports activities, utility relocation, extended construction period and associated delays in downtown redevelopment, etc.) are such that they cannot be

materially lessened by modifications of the shallow tunnel alignment/location. In short, these problems would remain regardless of tunnel location. Certain less fundamental issues may vary and, to the extent they are problems, could be ameliorated to a degree (e.g., distance to or below freeway pier foundations, location of surface injections, location of ventilation and fire/life/safety shafts, location of construction sites, etc.), but the major issues noted in the PAA report would still remain.

Given the underground conditions, locating the proposed downtown BART station at a depth of 140 feet under the shallow tunnel HST alternative would introduce for BART/VTA many of the same issues identified above for the HST deep tunnel alternative. In addition, the HST station and tunnel design requirements involve removal of a volume of material that is six times greater than that required for BART (for similar lengths).

The Authority is taking very seriously local concerns regarding aesthetics for proposed HST facilities in San Jose, including the elevated HST alignment and station. The Authority has met on many occasions with various stakeholders, including neighborhoods along the potential San Jose alignments, and will continue to do so. The Authority is committed to providing a high quality visual design for HST facilities in San Jose and to working cooperatively with the City and its residents toward such an end. Authority staff and City staff have negotiated a proposed cooperative agreement on this very point and anticipate that soon the City Council will consider it for approval.

The Authority staff will be issuing a Supplemental AA to the Board over the next few months, and we will report to the Board what we have heard regarding the PAA, including your request to include a tunnel alternative in the Draft EIS/EIR.

Again, thank you for your letter. I hope that we can continue to move forward working collaboratively on the HST project. I ask that you continue to work with our team to address the issues, and find solutions to help build this system in a manner that best enhances San Jose.

Sincerely

Roelof van Ark
Chief Executive Officer
California High Speed Rail Authority
rvanark@hsr.ca.gov
(916) 384-1488, direct

FREQUENTLY ASKED QUESTIONS
ON HIGH-SPEED TRAIN FACILITIES FOR SAN JOSE

The Federal Railroad Administration (FRA) together with the California High-Speed Rail Authority (Authority) have developed the following responses to frequently asked questions regarding the development of alternatives for the proposed high-speed train project in the San Jose area. The process and evaluation used by the Authority and FRA to identify the San Jose-related alternatives to be studied in the DEIR/EIS was presented in the "Preliminary Alternatives Analysis Report, San Jose to Merced Section High-Speed Train EIR/EIS," June 2010 (PAA). The PAA incorporated engineering and environmental information and identified potentially feasible and practicable alternatives to be carried forward in the Draft Environmental Impact Report/Environmental Impact Statement (DEIR/EIS). Appendix C of the PAA includes the "Downtown San Jose Tunnel Alternatives." The PAA and the appendix should be referred to in support of the following responses. The PAA can be viewed on the Authority's website http://www.cahighspeedrail.ca.gov/Lib_San_Jose_Merced.aspx.

How are alternatives selected for full analysis in the Project EIR/EIS documents?

For almost any proposed public or private project, there could be a large number of conceivable potential alternatives, but including a detailed analysis of every conceivable alternative in a project EIR/EIS is neither practical nor required. What is required is that a draft EIR/EIS analyze a reasonable range of potentially feasible alternatives. Thus, before preparing a draft EIR/EIS, the Authority and the FRA must identify the alternatives to be analyzed in the document.

Under the California Environmental Quality Act (CEQA) that governs EIRs, and the National Environmental Policy Act (NEPA) that governs EISs, alternatives need not be studied in an EIR/EIS if they would not substantially reduce significant environmental impacts, would not attain most of the basic project objectives, would not be potentially feasible or are not reasonable or realistic. This process of narrowing alternatives prior to public circulation of an EIR is often largely an internal agency process with limited public input and without public hearings. The results of that process are then briefly described in the draft EIR/EIS.

Instead of this typical approach, the Authority and FRA have chosen to seek extensive public and agency input on preliminary alternatives. For all sections of the California HST system, the initial development of potential HST alternatives for study in EIR/EISs is being described in public reports presented to the Authority Board. Those reports, moreover, are the subject of one or more rounds of public and agency comment. The Authority has actively sought input from the public and affected government agencies – both through written requests for input and public information meetings. The Authority and FRA have taken that input into account in their initial review of potential alternatives for study and summarized these reviews in Alternatives Analyses (AA) documents. These AA documents are issued well before any draft EIR is published. The first public AA reports are called Preliminary.

Many are followed by Supplemental AA reports, which are also presented to the Authority Board in public meetings. In addition, the Authority and FRA consult with federal regulatory agencies in determining the alternatives ultimately to be analyzed in draft EIR/EISs. All of the AA documentation informs the draft EIR/EISs and the final EIR/EISs, and then becomes part of the EIR/EIS written record to be considered by the Authority Board in making future decisions.

How were the San Jose Station Approach Alignment Alternatives defined?

The alternative analysis for the San Jose Station approach has followed the process described in the preceding question.

In order to identify a reasonable number of alternatives, the project staff prepared an initial range of alternatives based on the input received during the scoping process. The initial alternatives included the program alignment, four aerial alternatives and three underground alternatives. The team then met with the various stakeholders that proposed the alternatives, including the tunnel alternatives proposed by the San Jose Department of Transportation (SJDOT) and the community group the Voices of San Jose (VSJ), to better understand the objectives of each proposal. The two tunnel alternatives proposed by VSJ (Thread the Needle and 5100 m Tunnel) both included an underground HST station to be constructed below the existing Caltrain station and tracks. Due to the high probability of ground collapse given the poor soils in the area, construction under the active Caltrain and UPRR platforms and tracks was considered not practicable and not reasonable or realistic. Following a request by the City of San Jose, the Authority staff agreed to conduct additional investigation of the deep tunnel alternative and when staff determined that would not be constructable, developed a shallower tunnel alternative to be considered in the initial alternatives evaluation. Each remaining alignment went through a refinement process during the evaluation in order to minimize adverse impacts. The alternatives analysis then reviewed the program alignment, four aerial alternatives and two underground alternatives. A more detailed description of all the alternatives considered is included in the PAA.

For this early alternatives analysis, the designs were advanced to a 5% design – sufficient to identify the footprint and hence impacts of each alternative. This level of design is an industry standard for early evaluation of alternatives. Due to the complexity of the tunnel alternatives and following the request by the City of San Jose for additional study of the underground options, the designs of the deep and shallow tunnel alternatives were advanced closer to a 15% level. This level of design is typically used for a full alternatives analysis in a DEIR/EIS. Working with SJDOT, the project team developed a shallower cut-and-cover option with the proposed BART station 140 feet deep below it as an alternative to the deep tunnel because the deep tunnel was considered not constructable given the prevailing site conditions.

Extensive public outreach was conducted during the development of these alternatives. In March 2009, three scoping meetings were held in San Jose, Gilroy and Merced to receive input on the scope of issues that should be analyzed in the EIR/EIS for the San Jose to Merced section. Following scoping, the project team initiated several rounds of outreach meetings and workshops to inform the Alternatives Analysis process. In September 2009, Technical Working Group (TWG) meetings with

local, transportation, and resource agency representatives throughout the corridor were held in Gilroy and Merced. In October 2009, three community Public Information Meetings (PIMs) were held in San Jose, Gilroy and Merced. In December 2009, two more TWG meetings were held in Gilroy and Merced. In December 2009/January 2010, an additional three PIMs were held Merced, Gilroy and San Jose. In March, a workshop was held on the downtown San Jose alignments (specifically the deep tunnel alignment) followed by two additional open house meetings in San Jose in May that focused on a shallow tunnel. Between March 2009 and June 1, 2010, approximately 1,200 people attended the public meetings. Over 95 meetings were also conducted with public agencies, cities, city councils, chambers of commerce, neighborhood representatives and other stakeholders.

Following the release of the Preliminary Alternatives Analysis Report (Preliminary AA Report) on June 3, 2010, the project team met with elected officials and staff, key stakeholders and the public throughout the San Jose to Merced section. Two TWG meetings were held in June 2010 in Merced and Gilroy. Community open houses were hosted in San Jose, Gilroy, Los Banos, Dos Palos and Merced in June/July 2010 for the general public to review and comment on the alignment alternatives and station location options released in the Preliminary AA Report. Approximately 325 people attended these public meetings. In addition, the project team met with a variety of stakeholders (cities, agencies, and neighborhood representatives) during approximately 35 individual meetings.

The reasons for the location of the alignments reviewed in the PAA are as follows:

- **Refined Program Alignment:** The Program Alignment (along the Caltrain Corridor) was developed as from 2008 Program EIR for the Bay Area to Central Valley. This alignment maximizes the use of the publically owned Caltrain Corridor rights-of-way

- **Deep Tunnel:** the deep tunnel alignment generally followed the tunnel alignment proposed by the City of San Jose. The depth of the alignment was set to avoid the foundations of the I-280/SR-87 interchange and the proposed BART station. As surface restrictions were avoided, the horizontal alignment was straightened to maximize operating speeds, with a connection to proposed intermodal hub at the north end of the HST station.

- **Shallow Tunnel:** The initial alignment for the shallow tunnel proposed by San Jose Redevelopment Agency was to locate the station box parallel and to the east of the existing Diridon Station but this did not achieve the necessary design criteria for the HST platforms and trackwork. The HST platforms are required to be straight (on tangent) to permit level boarding with minimal gaps between the train carriages and the platform edge. The HST stations have separate station tracks to allow express trains to pass through the station while other trains are stopped. The turnouts where the station tracks diverge from the mainline also need to be on tangent and far enough away from the station to allow the trains to slow down or speed up within acceptable passenger comfort limits. Because of the tight curves on the San Jose station approaches these track were designed much shorter than typical 6000 feet required for an HST station. As TBM construction cannot be used for diverging alignments, the turnouts would need to be constructed using cut and cover methods. To be able to use cut and cover construction the alignment would need to be as shallow as possible and hence the need to cross under I-280 where there were no deep foundations. This location was between Bird Avenue and the I-280/SR-87

interchange. The tangent length between this location crossing under I-280 to the curve north of the Alameda was just long enough to accommodate the turnouts, station tracks and platforms.

The shallow tunnel alternative would be in a mined tunnel north of Tamien station to pass under SR 87, the residential neighborhood of Greater Gardner, and I-280. The cut and cover box would begin north of W. San Carlos St. to avoid homes immediately north of I-280 and extend north to the Alameda, over a relocated BART tunnel and station. From the Alameda, the alignment would then be mined as it passes under the active railroad tracks on a curve and then a separate cut and cover box would be constructed to accommodate the turn outs north of the station where the station tracks rejoin the mainline.

A major impact of the shallow tunnel option is the requirement to move the BART tunnel and station deeper and to avoid the I-280 freeway foundation piles. One of the consequences is that this alignment would be placed under the proposed ballpark.

It should be noted that a change in the proposed tunnel portal at the Tamien Station to avoid a National Register Archeological site would require additional tunnel lengths, acquisition of additional easements and private property for a new portal and additional tunnel lengths, and associated potential increases in impacts and costs.

- **Downtown Aerial:** The aerial alignment was developed along the same alignment as the deep tunnel alignment, but in an aerial configuration. (Please note that both the SR 87/I280 and the Program Alignment also include an aerial station and alignment.)

- **SR 87 / I-280:** This alignment was initially proposed by the City of San Jose to follow, to the extent possible, the rights-of-way for these two freeways and to locate the HST station above the existing Caltrain station platforms.

- **Three Track:** this proposal from the City would reduce the number of tracks in the Caltrain Corridor from four to three – one for Caltrain/UPRR and two for high-speed rail with the intent to minimize impacts to adjacent properties.

What are the property impacts of each alternative?

The alternatives evaluation estimated a range of the number of affected properties to provide a broad comparative assessment of the potential alternatives and to reflect the possibility of further deign refinements (see Table 1). Although not quantified in the PAA, the City of San Jose staff in a report to council did estimate that there would be a need for approximately 80 property easements for any tunnel option. These easements would be to protect the tunnel from future deep underground activities such as foundation piles, basements, and well drilling that could adversely impact the integrity of the HST tunnels. Typically there would be a one-time payment for the easement rights based on an appraisal of the property value at the time of acquisition to compensate the property owners.

North of the station property, impacts to abutting properties (e.g., need for easements, etc.) were assessed based on the width of the Caltrain right of way. Where that right of way is 100 feet or greater, there would be no direct impact to property rights. As that right of way narrows below 100 feet, impacts to properties are expected to occur and to increase as the right of way width decreases.

TABLE 1: SAN JOSE STATION APPROACH SUBSECTION EVALUATION MATRIX

Measurement Criteria	REFINED PROGRAM ALIGNMENT (WITHDRAWN)	DEEP TUNNEL (WITHDRAWN)	SHALLOW TUNNEL (WITHDRAWN)	SR 87 / I-280 (CARRIED FORWARD
• Displacements				
Residential Displacement	• 0-2 dwelling units - Single-Family Residential (SFR) • 0 dwelling units - Multi-Family Residential (MFR) • 0 dwelling units – Mobile Home Parks (MHP)	• 0 dwelling units - SFR • 0 dwelling units - MFR • 0 dwelling units – MHP	• 0 dwelling units - SFR • 0 dwelling units - MFR • 0 dwelling units – MHP	• 0-1 dwelling unit - SFR • 0 dwelling units - MFR • 0 dwelling units - MHP
Business Displacement	• 0 units – Commercial • 0 units – Industrial • 1 unit – Nonprofit	• 0 units - Commercial • 0-1 units - Industrial	• 0-1 units - Commercial • 0-3 units – Industrial	• 0-1 units - Commercial • 10-15 units - Industrial
Properties with Access Affected	• 10 parcels	• 0 parcels	• 0 parcels	• 6 parcels

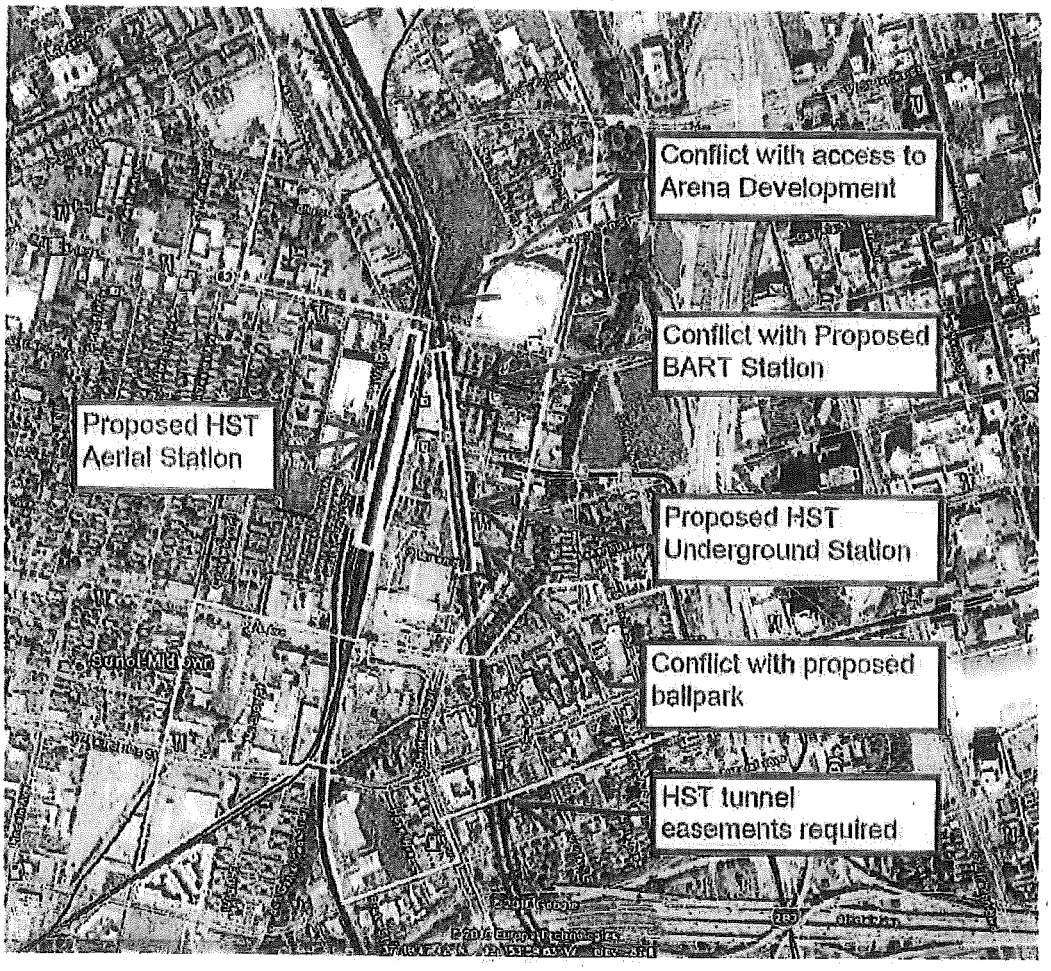
To ensure that property owners are aware of the project, the teams have compiled mailing lists initially comprised of properties adjacent to the proposed right of way for all the alternatives and within 500 feet of a station location. This initial list has been greatly expanded with attendees at HST events and requests for information though multiple media. The mailing list related to San Jose includes approximately 26,600 San Jose residences and businesses.

In addition to the potential impacts to existing residential and commercial properties, there could be impacts to the planned redevelopment of the Diridon Station and surrounding area. The City of San Jose, in coordination with the San Jose Redevelopment Agency, and other local and regional transportation agencies, are developing a plan for a ½-mile radius around Diridon Station (approximately 500 acres of land). The objective of this process is to provide a vision and framework for higher intensity/transit-oriented development (TOD) in the area. The process involves developing a Station Area Plan around Diridon Station with related transit and station-area planning activities, and includes environmental clearance under CEQA. The Diridon Station Area Plan will provide a vision and guidance for this unique destination with a broad mix of transit-supportive uses. In addition, the Plan anticipates pedestrian, bicycle, open space, and street connections from the greater downtown and surrounding neighborhoods.

The estimated construction period for the shallow tunnel alternative is seven years including four to five years for the station box. The underground station would be positioned diagonally across the heart of the redevelopment area in order to provide sufficient tangent track length to accommodate

the station platform tracks and turnouts. As shown in Figure 1, construction of this alternative would severely disrupt concurrent implementation of the Diridon Station Area Plan. In addition to the construction of the station box would be extensive relocation of utilities and other enabling works to support the VTA LRT and Los Gatos Creek.

FIGURE 1: LOCATION OF UNDERGROUND HST STATION RELATIVE TO PROPOSED DIRIDON STATION AREA DEVELOPMENT



Why can BART be built in a tunnel but not High-Speed Train?

A question often asked is, "Why can BART propose to build a Diridon Station using cut and cover methods, yet the Authority finds this impractical for HST?" The major reason the HST cut and cover facility impractical is the magnitude of the HST tunnel and station complex in comparison to the proposed BART tunnel and station complex. The HST complex has over fives times longer length of

tunnels, which are twice the diameter of the BART tunnels, and the HST station is almost twice as long as the BART station and two times wider. In all, the total volume of the HST tunnels and station approach six times larger than the BART tunnels and station. Table 2 compares the size of the HST Tunnel/Station facility to the size of the proposed BART tunnel/station facility (for the same total length).

TABLE 2: VOLUME COMPARISON TABLE OF HST TUNNEL/STATION VERSUS BART TUNNEL / STATION

Facility Component	HST (LxWxD)	BART (LxWxD) for Same total length as HST	Volume HST Tunnel/Station (Cubic Yards)	Volume BART Tunnel/Station (Cubic yards)
Tunnels	21,200 linear feet LF x 30 ft Diameter	8,800 linear feet x 15 ft Diameter.	554,700	115,200
Station	1,400LF x 140FT x 60FT	900FT x 70FT x 60FT	436,000	140,000
Track Transition Structures	North of HST station box = 600FT x 150FT x 60FT South of HST station box = 800FT x 200FT x 60FT	None Required	555,000	N/A
Tunnel Crossovers, Vent Shafts, Access Shafts	9 each x 40FT x 30FT Diameter.	None required in Diridon Station Area	9,420	N/A
Total Volume			**1,555,555**	**255,000**
Ratio of Volumes			**6.10**	**1.00**

The scale of the HST facility compared to a BART facility is represented in Figures 2 and 3. To fit this HST tunnel and station facility in this downtown area would introduce impacts, as described above, but at an order of magnitude substantially larger than the proposed BART surface station. The impacts resulting from the scale and magnitude of building the HST Tunnel/Station facility in the San Jose Diridon Station area are the most important reason why it is impractical.

The depth of the HST Deep Tunnel Alternative makes the soils much more unstable than what the more shallow BART tunnel and station would experience. The soil boring logs available from the BART project and I280/SR87 interchange provided sufficient soil information to characterize the soil without the need for additional sampling and were adequate for preliminary engineering.

FIGURE 2: PLAN OF HST SHALLOW TUNNEL/STATION ALTERNATIVE

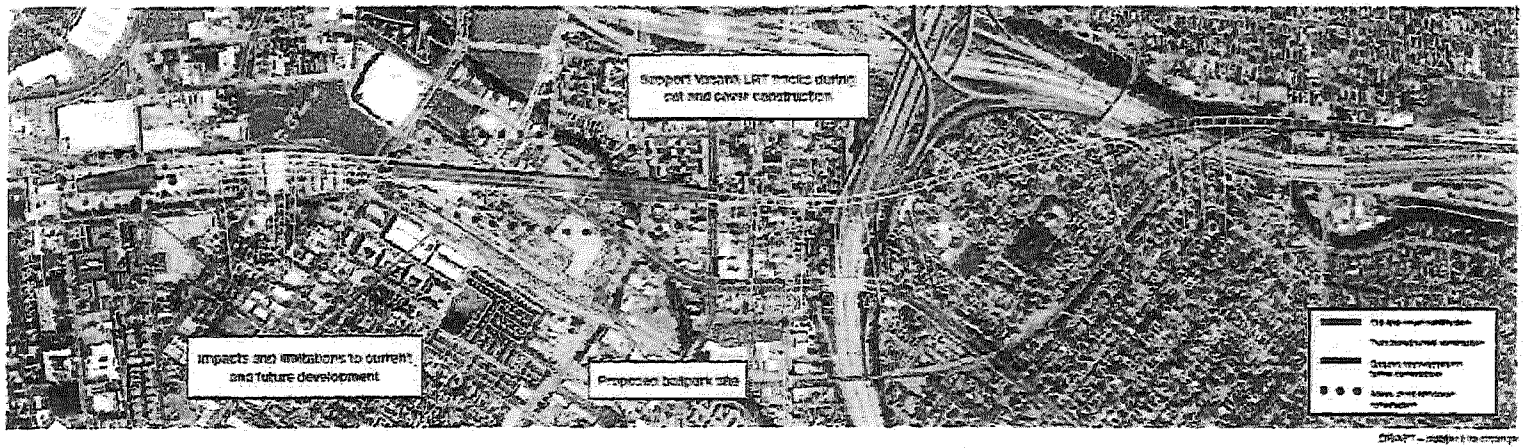
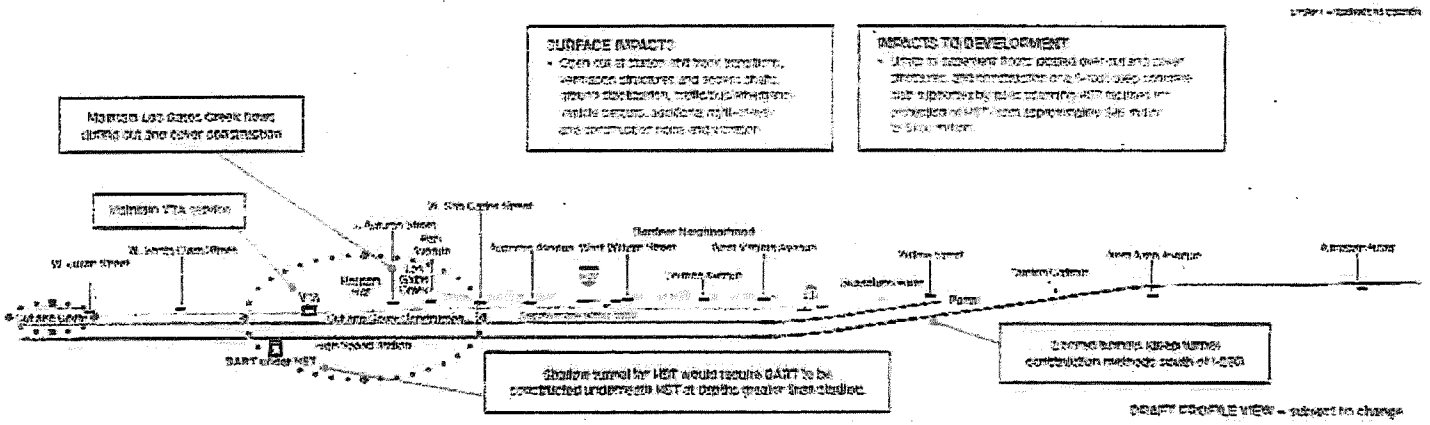


FIGURE 3: PROFILE OF SHALLOW TUNNEL/STATION ALTERNATIVE

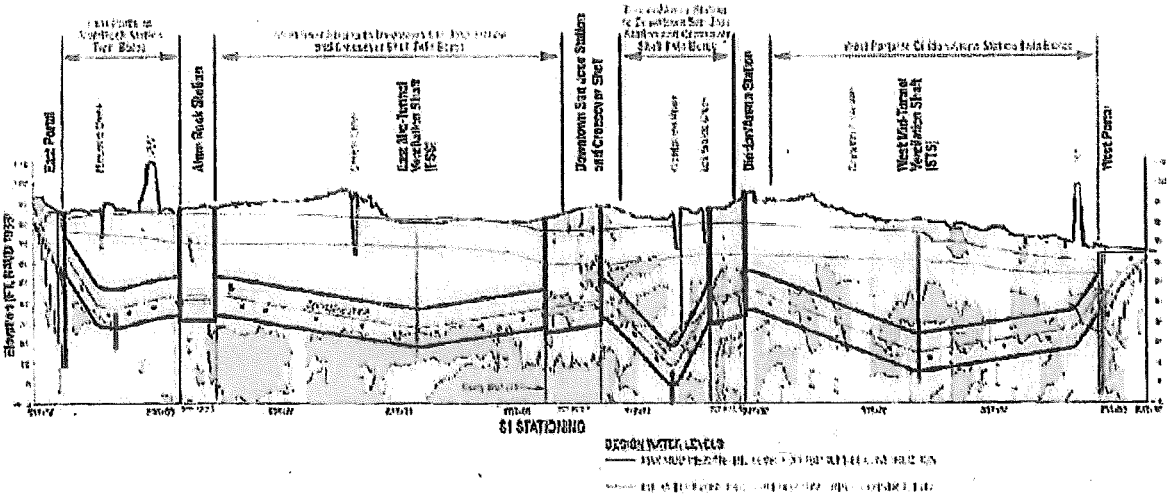


The high construction risk for the deep mined station in unstable soils, and a high water table, was a major factor in determining the deep tunnel alternative to be impractical. The size of the cut and cover excavation for the HST facility below the water table would increase risks in the following areas:

- Increased settlement in the area due to extensive dewatering of cut and cover excavations
- Potential for collapse in the excavations due to loose, saturated, and gravelly soils in the area.

Figure 4 shows the prevalent high water table for the BART soil profile in the area of the Diridon Station. The maximum hydrostatic head (i.e., depth under top of water table) of the BART tunnels and station is approximately 40 feet, which equals a water pressure of 17 pounds per square inch. The Deep HST tunnels and station would encounter a hydrostatic head of approximately 140 feet, which equals a water pressure of 61 pounds per square inch or four times higher water pressure than the proposed BART complex. For the foregoing reasons and others detailed in the PAA, the Authority and FRA determined not to carry forward the Deep Tunnel Alternative.

FIGURE 4: SOIL PROFILE ALONG BART ALIGNMENT



The Shallow Tunnel Alternative would be constructed using tunnel boring machines (TBMs) and cut and cover methods similar to the BART system, however on a much larger scale – see Table 2 of volume comparisons. The distinct difference in comparisons between HST facilities and BART facilities in combination with major surface disruption in the prime redevelopment area (discussed earlier), and other factors identified in the Tunnel Alternatives Report (Appendix C to the PAA) led the Authority and FRA to determine not to carry forward the Shallow Tunnel Alternative. It is noted that placing the HST Tunnel/Station above the BART Tunnel/Station (as the Shallow Alternative would do) increases the risks and difficulty of building BART through San Jose.

The estimated construction duration for the HST Tunnel/Station alternatives was based on construction of similar type/facilities and proportioned to the size of the HST underground facility. As described in

the Tunnel Alternatives Report, many different tunnel configurations and construction methods were considered to develop the most cost effective solution, and a thorough analysis was performed to locate the alignment in a location with the least amount of impacts.

Construction of the tunnels north of the station was assumed to be similar to the approach from the south, using TBMs. As described in the Tunnel Alternatives Report, it is the construction of the station box and associated special trackwork that would have the majority of the impacts and construction risk. These issues further supported the determination not to carry the tunnel alternatives forward.

Why were the tunnel alternatives not recommended for study in the Draft EIS/EIR?

For the deep tunnel alternative, Chapter 4 of the PAA states, "This type of station construction is not under consideration for any of the stations in the 800-mile California HST system and has not been used for any HST Station in the world. Subsurface HST stations are constructed using cut-and-cover techniques rather than mining. Existing HST stations were constructed using cut-and-cover techniques (e.g., HST stations in Taiwan, Berlin Central Station) or the pipe roof arch method and "sheeted trench" method (e.g., Antwerp HST station in Belgium) rather than traditional mining methods." Thus, the deep tunnel alternative with the mined station was determined to be neither feasible or reasonable.

The shallow tunnel alternative was not recommended for study in the draft EIR/EIS "because it is impracticable due to major constructibility issues, surface disruption to surface land uses, additional right-of-way requirements, limits to future development, the relocation and redesign of the proposed BART Diridion Station and associated tunnels along with much greater construction risk, impacts to Los Gatos Creek, impacts to VTA and Caltrain, high cost factors, and lengthy construction schedules and construction impacts." See Chapter 4 of the PAA.

An evaluation of foreseeable potential risks and impacts associated with the different types of proposed HST San Jose Tunnel/Station alternatives is provided in Table 3 (which is Table 4.1-2 from the PAA). Seven evaluation criteria including 24 potential risk items are considered. The evaluation indicates that "Deep Mined option" and "Shallow Cut-and-Cover option" carry far more "high" risks and less "low" risks than "Aerial option", in particular for the evaluation criteria of "cost and schedule", "constructability" and "geotechnical constraints".

Thus the underground options are <u>not</u> practicable due to unsafe mining conditions (poor soils combined with high groundwater), construction schedule, potential for settlement, extensive surface disruption and very high construction cost and should be eliminated from further evaluation. In the case of the shallow tunnel option, the proposed BART station and extensions north to Santa Clara and east to downtown would also have to be redesigned and placed much lower in the existing poor ground conditions.

TABLE 3: RISK/IMPACT EVALUATION MATRIX FOR SAN JOSE TUNNEL/STATION ALTERNATIVES

Evaluation Criteria		Aerial Option[1]			Deep Mined Option[2]			Shallow Cut & Cover Option[3]		
Cost and Schedule	Operating Costs	L					H		M	
	Capital Costs	L					H		M	
	Schedule	L					H		M	
Constructability	Constructability	L					H		M	
	Surface Disruption		M			M				H
	Disruption to Existing Railroads		M		L					H
	Damage to Surface/Near Surface Structure	L					H		M	
	Impact to Existing Foundations	L					H		M	
	Disruption to and Relocation of Utilities		M		L					H
Geotechnical Constraints	Ground Type	L					H		M	
	Settlement	L				M		L		
	Flooding/Inrush of Water to the Excavation	L					H		M	
	Groundwater	L					H		M	
Disruption to Communities	Residential/Business Impact		M		L					H
	Local Traffic Maintenance & Detour Routing		M		L					H
	City Division		M		L			L		
Environmental Impacts	Noise/ Vibration/ Dust			H	L					H
	Visual/Aesthetic Issues			H	L				M	
Environmental Resources	Biological Resources		M		L			L		
	Cultural Archaeological Resources	L				M	H		M	H
Others	Emergency Response	L					H		M	
	Staging	L			L			L		
	Future Development	L				M				H
	Right-of-way		M			M			M	
Notes:	1. SR-87/I-280 Aerial Alternative and Refined Program Alignment 2. Deep Tunnel Option, 5100m Tunnel & Thread the Needle Tunnel 3. Shallow Tunnel Option Risk/Impact Rating: L (Low) M (Medium) H (High)									

What was used in the cost comparison for each alternative?

The cost comparison in the PAA used the program base unit costs in 2009 dollars. The 2009 unit prices were increased in the California High-Speed Rail 2009 Business Plan to account for program implementation, final design and contingencies in addition to escalation to year of expenditure. However, as the PAA evaluation used relative cost factors, the 2009 unit prices gave a good basis for comparison.

Included in the estimate for all tunnel alternates were:

- Track Items
- Earthwork
- Structures, Tunnels and Walls
- Mechanical & Electrical
- Grade Separations
- Building Items
- Rail and Utility Relocation
- Right of Way Items
- Environmental Mitigation
- System Elements
- Electrification Items

A summary of the capital costs for the downtown San Jose area are provided in Table 4.

TABLE 4 – CAPITAL COST ESTIMATE (2009 DOLLARS MILLIONS)

	Construction ($2009)	Program & Contingency (35%)	Total Capital Cost ($2009)	Cost Factor
North of De La Cruz to Diridon				
Aerial	$151	$53	$204	1.00
Tunnel	$455	$160	$615	3.01
South of Diridon to Tamien				
Program Alignment	$288	$103	$398	1.00
I280/SR87	$359	$126	$485	1.22
Deep Tunnel	$2,127	$762	$2,941	7.39
Shallow Tunnel	$1,461	$524	$2,020	5.08
Combined Total Capital Cost				
Aerial North and I280/SR87 South			**$689**	**1.00**
Tunnel North and Shallow Tunnel South	Total does not include additional cost of $140 addition to BART+ and $100 HST protection*		**$2,635**	**3.82**

\+ Estimated additional costs to construct deeper BART station box

* To prevent potential damage to the HST station/tunnel from above, a pile supported, 5 foot thick, 200 feet wide, 2,300 feet long, reinforced concrete slab would be constructed above the facility. This would allow flexibility for future development of the Diridon Station Area that has not been yet determined with an assumed building height limit of ten stories.

One item not included in the PAA cost evaluation of a tunnel is a protective covering slab that would permit surface development. If included (as is done in Table 4), the added cost would further support the decision not to carry forward tunnel alternatives. A major consideration for the shallow tunnel option was the potential disruption to the future redevelopment of the Diridon Station Area. As a master plan or specific development has not been approved for the area, a protective slab was assumed over the full extent of the underground station and part of the tunnels. This would not preclude the development of future "air rights" over the station. But as development plans have yet to be determined so a precise slab size and thickness could not be determined, this item was not factored in to the PAA evaluation. Any slab would be costly, however, and would limit (regardless of slab engineering) surface development flexibility. For these reasons, the aerial option over the existing Diridon Station train platforms was determined by the project team in conjunction with City of San Jose staff to better support future development of the area as construction conflicts would be avoided and the HST station would act a focal point of activity.

Standard structure types were assumed for the cost estimate used in the evaluation. Should enhanced structure types be considered due to local participation or as visual mitigation, the cost estimate will need to be revised. The Authority and City of San Jose are developing an agreement that will address the design and aesthetics of the above ground structures.

A common question is how the cost for the shallow tunnel increased from $1.3 billion to over $2.6 billion, as shown in Table 4, which includes the costs north of the Diridon Station. One needs to understand the source of the numbers. The specialist tunnel consultants estimated the cost of the shallow tunnel and station box at $1.3 billion. This estimate did not include the station structure or finishes, tunnel portals, trackwork, ventilation, communication systems, electrification, right-of-way, mitigation, and program implementation costs as these are based on system wide costs. When all the costs are added together, the total program cost of the shallow tunnel was slightly over $2.6 billion as shown in Table 4.

Combining HST and BART facilities was considered for potential cost savings. With the BART extension from Berryessa to Santa Clara not planned for construction before 2018, there would be little opportunity for construction savings as the HST infrastructure would be completed before then. The potential for shared facilities will continue to be explored through the development of the vision for Diridon Station as an integrated multimodal transportation hub.

Standard structure types were assumed for the cost estimate used in the evaluation. Should enhanced structure types be considered due to local participation or as visual mitigation, the cost estimate will need to be revised. The Authority and City of San Jose are developing an agreement that will address the design and aesthetics of the above ground structures.

The primary cost factor in the evaluation was the capital cost of the construction. The ongoing operations and maintenance costs were also considered. Tunnels and underground facilities have higher operating costs due to the need for fire/life/safety systems, drainage and pumping systems, communication systems, ventilation, lighting, emergency lighting, and restricted access. Aerial

structures also have associated maintenance costs, but by encouraging active uses around and under the structures, the Authority expects to minimize graffiti or other undesirable activities.

How will public input on the Preliminary Alternatives Report be addressed since the Authority Board has already approved it?

Due to the importance that the Authority places on public input, each step of the alternative analysis process has included opportunities for public review and comment. Public input substantially informed the preparation of the PAA, and will continue to inform the development of documents for the Authority. As discussed above, extensive public input has been gathered by the project team and used to refine the alternatives and identify areas for further study. The detailed evaluation matrices included in the PAA provide the results of the evaluation of each alternative based on the identified objectives and evaluation measures. Certain data were provided as a range to reflect the preliminary nature of the design and the evaluation. The documents were prepared at a level of detail appropriate to the development of the design. The program alignment was based on high-level criteria that have been refined through the alternatives analysis phase. The alternatives recommended for further study will now be subject to detailed analysis that will be presented in the DEIR/EIS.

The public input gathered through the meetings and direct correspondence will be summarized and presented to the Board for information along with any recommended adjustment to the alternatives as part of the Supplemental Alternatives Analysis (SAA). Consistent with CEQA's requirements, the Draft EIR/EIS will include a brief discussion of alternatives considered pre-EIR/EIS but not studied in more detail in the document. Following public circulation of the Draft EIR/EIS documents, the Authority will respond to comments received and include those responses in a Final EIR/EIS. The Final EIR/EIS, including public comment and responses, and all the AA documentation will be considered by the Authority Board in making decisions regarding project alternatives and approval. The process, and thus also any decision regarding alternatives, is not final until the completion of the Final EIR/EIS and certification by the Board, followed by decisions on the final placement of HST facilities.

COPY

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September 29, 2010

Roelof van Ark
Chief Executive Officer
California High Speed Rail Authority
925 L Street, Suite 1425
Sacramento, CA 95814

Dear Mr. Van Ark,

Neighborhood and business groups in central San Jose urge the California High Speed Rail Authority (CHSRA) to include an underground option for San Jose in the project's Environment Impact Report.

While we continue to support high-speed rail, the decision on the alignment through downtown San Jose requires further study. The San Jose City Council meeting Sept. 14 on this issue raised a new set of questions deserving timely answers:

1. We did not hear CHSRA staff nor City of San Jose Department of Transportation (CSJ DOT) staff present any "fatal flaws" for continued study of underground options. CHSRA staff stated that a San Jose tunnel was "unfeasible and impractical." The unfeasible justification centered on cost. CHSRA and CSJ DOT staff reports to the San Jose City Council nearly doubled the underground project costs from $1.3 billion in June to $2.5 billion, while aerial costs were announced at $500 million. CHSRA staff's explanation on Sept. 14 assigned the tunnel's cost escalation primarily "to accommodate future development."

a) What are the specific "accommodations" CHSRA staff estimated that added more than $1 billion to San Jose's underground costs?
b) What alternative "accommodations" did CHSRA consider other than a mat foundation covering the entire site for San Jose's underground option?
c) Do the cost comparisons (tunnel versus aerial) include the potential value of future 'air rights' for development on top of a tunnel alignment?
d) Are there any corresponding potential development rights for the aerial scenario?
e) Is the cost of an 'iconic' above ground station included in the aerial cost estimate?

f) If San Jose insists on world-class quality station and aerial structure architecture, who would pay for the additional cost?
g) The aerial alignment will likely have significant ongoing maintenance costs associated with graffiti removal, homeless encampments, rail wear on the "S" turn and "wheel squeal" noise abatement. Have these recurring expenses been factored into a net present value "cost" when compared to the underground option?

2. The BART project has selected tunnels and a subway station in the very same vicinity that CHSRA does not want to continue study for a tunnel and station. CHSRA has used "unstable soils" as one of its reasons for stating the tunnel is unfeasible while clearly it was feasible for BART.

a) How is it possible BART finds underground feasible but not CHSRA?
b) What soil sampling did CHSRA conduct *in addition* to those samples drawn for BART?
c) Where were the CHSRA samples taken?
d) What are the differences with the nearby tunnel recommended for further study by CHSRA just north of this area near the San Jose/Santa Clara border?

3. On Sept. 14, CHSRA and CSJ DOT staff said the tunnel option would take seven years of construction and "tear up the city." Our BART project managers explicitly demonstrated how they could shorten construction and minimize impacts for the San Jose underground route that utilizes bored tunnels and cut and cover stations.

a) How did CHSRA staff arrive at the construction period for the underground option, and likewise, its estimates for the aerial construction?
b) What analysis was done on construction strategies that could shorten the timeline and construction impacts?

4. CHSRA staff also reported on Sept. 14 that "80 property easements" are needed for the underground option.

a) Please elucidate the characteristics of these easements, such as whether they are deep underground easements and how they might impact existing or future property use.
b) Additionally, what sort of financial compensation is associated with these easements?
c) In the Sept. 14 meeting, your staff did not elaborate on the "about 10" property takings needed for the aerial option, nor did your staff indicate the number of property takings required by the aerial alignment north of Diridon, which looks like a much bigger number than 10 with some potential larger acquisitions required. How were all these property acquisitions for the aerial structure from Taylor to Tamien accounted for in your preliminary design, public outreach and cost estimates?

5. The City of San Jose requested on several occasions – both in writing and in person at CHSRA board meetings – that CHSRA study a "best" underground alignment.

a) CHSRA staff rejected both the deep tunnel and shallow tunnel options in its June report.

How and when was it determined that these two tunnel alignments were the "best" underground alignments and that no other alignment would resolve any of the concerns, such as conflict with the Native American burial site at Tamien?

b) CHSRA staff on Sept. 14 said they had completed "almost 15 percent engineering" on San Jose's tunnel options. Was this level of engineering work included for both the shallow and deep tunnel alignments in the June Alternative Analysis report?
c) Which underground alignment did CHSRA staff ultimately conclude the "best option" as requested by San Jose and why was it deemed the "best?"

6. Because the City of San Jose has been asking CHSRA since Dec. 2009 to seek and analyze a "best" underground alignment and CHSRA now recommends no further study of the "best" underground option – or any other underground options – we are concerned about the integrity of the EIR process.

a) How will the EIR not be defective and at risk of legal actions by interested parties outside of San Jose who are determined to undermine the entire project?
b) Since federal law mandates a full EIR must include all viable options, how will the project's EIR be complete if CHSRA eliminates San Jose's underground options *before* the study?

7. The CHSRA Alternative Analysis report and appendix released the same morning of the Authority's June 3 board meeting eliminated all alignment options through Central San Jose except the so-called SR87/I280 aerial route, preferred by CHSRA and CSJ DOT staff.

a) For what reasons does CHSRA choose to release recommendations and reports *after* public hearings are underway?
b) How does this benefit the public participation process and foster collaborative decision-making?
c) For what reasons does CHSRA release reports without sufficient supporting empirical data for the decision (aerial alignment) contained within the report?
d) How will the lack of specific detail in the CHSRA's released documents to date on San Jose's alignment options inform or place at risk the subsequent EIR process?

8. CHSRA staff indicated that the tunnel option would be detrimental to development in the Diridon Area. Most metropolitan areas have unitized the joint public-private development approach to preserve future development opportunities and build substantial structures on top of tunnels and underground stations.

a) Why is this development approach utilized around the world not viable in San Jose?
b) Everyone encourages transit-oriented development around stations. How did CHSRA staff reach its conclusion that such development would be enhanced by the aerial structure more than the underground option when experience tells us differently (San Francisco Transbay Terminal, etc.)?

9. As for an underground option in San Jose being "impractical," the preponderance of responses given at the Sept. 14 council meeting were about timing: potential delay to the

project in order to study the underground, plus potential delays to the funding stream. Given our understanding the San Jose to San Francisco section is in the initial project phase (not San Jose to Merced):

a) How are the San Jose to Merced decisions impacted? For instance, how does the timing on the northern SF-SJ route drive the decisions on the southern alignment?
b) How will the delays that are apparent from city council actions on the Peninsula for the SF-SJ section allow more time to study options in San Jose?
c) Earlier this month, Caltrain officials suggested phasing construction to allow more time to study trenching and tunneling along the Peninsula in those communities that requested it. How would this approach allow for further comprehensive study of a tunnel alignment in San Jose?

10. Impractical can mean many things, which is why it would seem the environmental factors are critical to study at this stage of the project. Neighborhood groups throughout Central San Jose are particularly interested in these elements. While we understand the EIR has yet to be released and the analysis in the EIR may differ, the **attached chart** is an example of issues that could be vetted in the EIR, particularly as it pertains to the tunnel in comparison to the aerial. The **second attachment** is a copy of the summary from the scoping document submitted to CHSRA in April 2009 for a tunnel option that CHSRA withdrew prior to the release of your June 2010 Alternatives Analysis.

a) For what reasons and when did CHSRA staff reject these and other underground options in San Jose, such as the deep and shallow tunnel alignments?
b) For what reason did CHSRA not combine elements from multiple alignments to achieve a "best" underground option for San Jose?
c) For what reason did CHSRA not evaluate other areas besides Tamien Station for a tunnel portal since it is well known the area is a sensitive archeological site?

11. The incremental cost estimates given for accommodating a shared underground BART station with high-speed rail were $140 million in your June report. It is our understanding this estimate was for the shallow tunnel high-speed rail option (HSR running above BART tracks).

a) How does this incremental underground cost, if at all, include the potential efficiencies from BART and high-speed rail sharing station construction and infrastructure? Please include the criteria assumptions and computations you used to make your estimate.

12. By virtue of splitting the two Bay Area high-speed rail sections at Diridon Station, it is difficult for San Jose to receive a complete picture of the project in our city.

a) How will future planning documents about the north and south of Diridon Station areas provide improved transparency, accountability and increased coordination?
b) At what point will a comprehensive look at the Diridon Station Area – north and south – be prepared and offered for local public input prior to the completion of the EIR process?

Thank you for addressing our questions and the continued consideration of a tunnel option for San Jose.

Sincerely,

Art Bernstein
San Jose Downtown Association

Pat Dando
San Jose Silicon Valley Chamber of Commerce

Helen Chapman
Shasta Hanchett Park Neighborhood Association

David Dearborn
Willow Glen Neighborhood Association

Pete Kolstad
Market Almaden Neighborhood Association

Steve Kline
Burbank/Del Monte Neighborhood Action Coalition

Kymberli Brady
San Jose Downtown Residents Association

Robert Sippel
Rose Garden Preservation Neighborhood Association

Phil Hood
Delmas Park Neighborhood Association

John Urban
Newhall Neighborhood Association

Debbie Wade
Greater Gardner

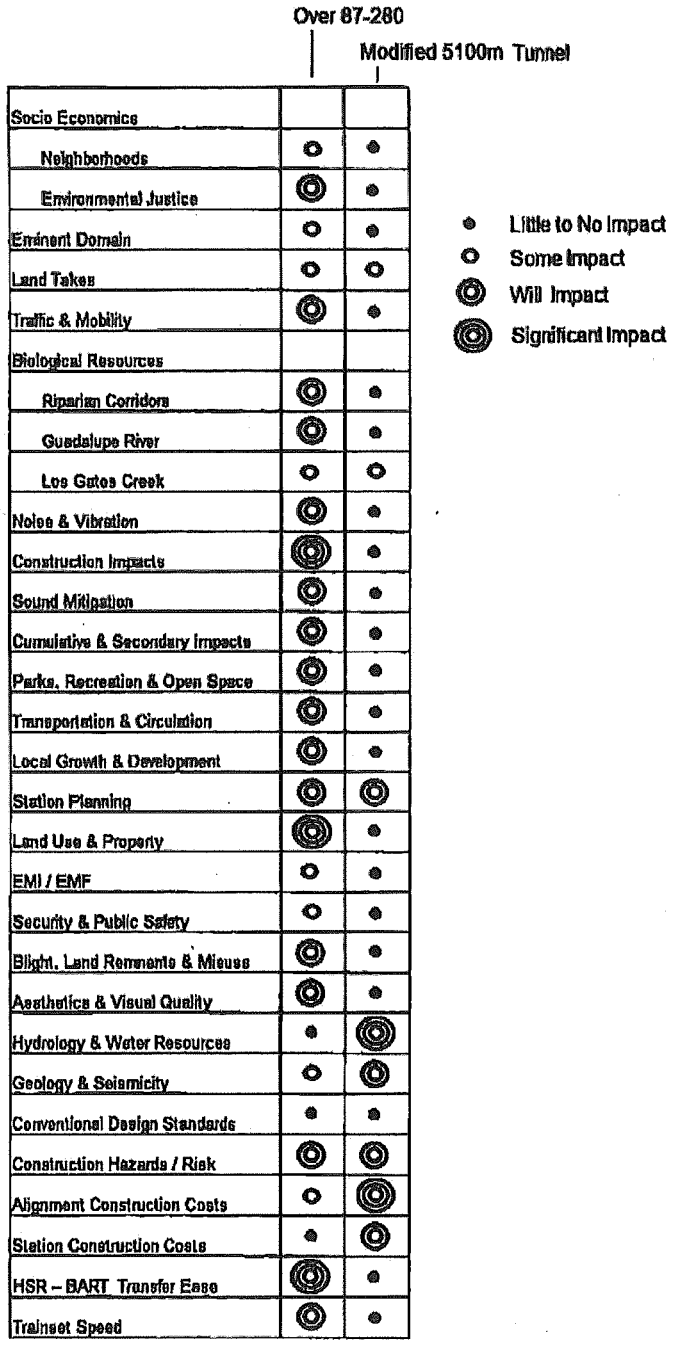
Clay Reigel
College Park Neighborhood Association

cc. CHSRA Board members
Mayor Chuck Reed and San Jose City Council Members
Honorable Zoe Lofgren, 16th District, U.S. House of Representatives
Honorable Mike Honda, 15th District, U.S. House of Representatives
California State Senator Elaine Alquist, District 13
California Assemblymember Joe Coto, Assembly District 23
Supervisor George Shirakawa, District 2, Santa Clara County
Debra Figone, San Jose City Manager
Harry Mavrogenes, San Jose Redevelopment Agency Executive Director

attachments: CEQA chart; tunnel summary report

Reasons to Keep HSR Tunnel Option in the Mix

David Dearborn, Author, 5100m Tunnel Option



5100m Overview

Transforming San Jose from "The Bedroom Community" of the South Bay to a world-class urban city requires looking forward.

50 years, 100 years from now, will the country's first HSR system have a route that represents California's commitment to the future?

The 5100m alignment gets its name from the tunnel which begins just north of Curtner Avenue, crossing at right angles under the Guadalupe River north of Willow Street, and unobtrusively beneath highly valued TOD and RDA land to Diridon Station It will:

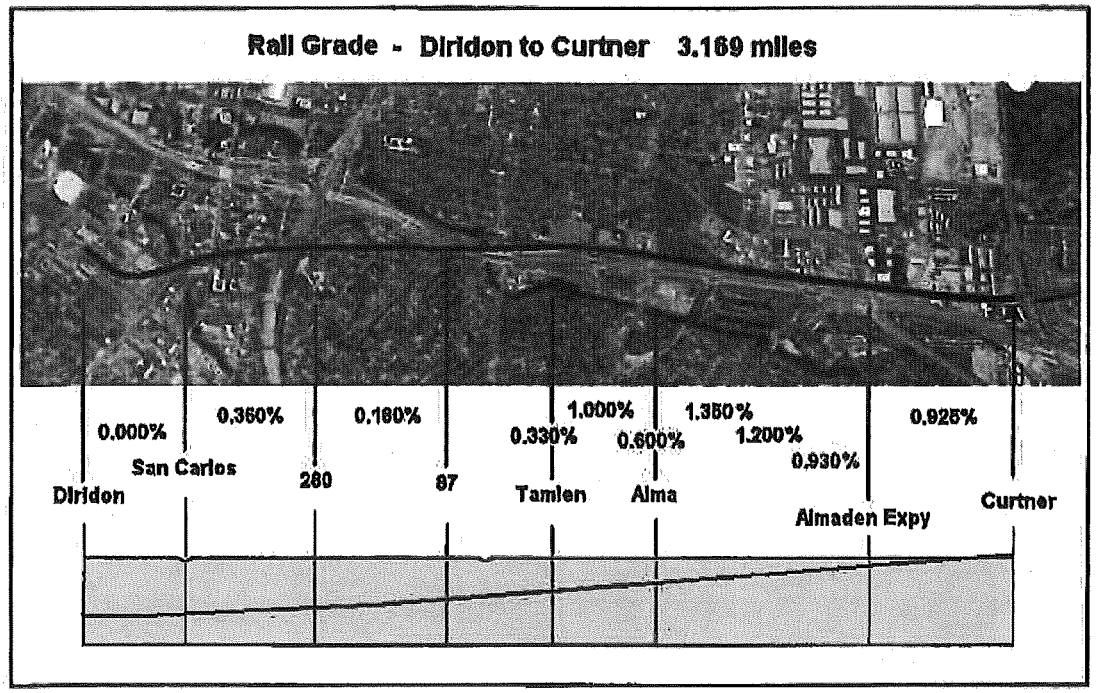
- Facilitate the faster, lighter weight and more energy efficient train sets of the future.
- Reflect appreciation for San Jose's history, livability and its sense of community for 1.5 to 2.0 million people.
- Facilitate increased degrees of freedom in land use planning as San Jose continues to grow.

There is only one opportunity to get this right.

There will be no going back.

San Jose is the 10th largest city planning for a world-class multi-modal transit hub, mall and urban center.

Figure 1,



Note: Final 5100m track grade and depth at Diridon designed as appropriate for final station design.

Chart 1.

From (1)	To	Dist From To	Grade Elev at "from" point	Cost Elemnt	drop ft	% grade	Track below Curtner at "To"	Track below Grade ft
Curtner	Curtner + 300m	984	134	A	9.1	0.920%	9.1	9.1
Curtner + 300m	Almaden Expy	1,312	139	B	12.2	0.930%	21.3	20.3
Almaden Expy	Almaden Expy + 200m	656	132	B	6.1	0.930%	27.4	25.4
Almaden Expy + 200m	Almaden Expy + 700m	1,640	127	C	19.7	1.200%	47.0	40.0
Almaden Expy + 700m	Alamn	1,312	121	D E	17.7	1.350%	64.8	51.8
Alma	Tamien	984	115	D E	5.9	0.600%	70.7	51.7
Tamien	Willow	1,312	115	D E	13.1	1.000%	83.8	64.8
Willow	87S flyover to 280N	3,281	111	D E	32.8	1.000%	116.6	93.6
87S flyover to 280N	San Carlos near Josefa	3,281	99	D E	32.8	1.000%	149.4	114.4
San Carlos near Josefa	Station Rail South entry	1,640	98	D E	6.6	0.400%	156.0	120.0
Station Rail South entry	Diridon platform	328	97	D E	0.0	0.000%	156.0	119.0

A	at grade - plus or minus 3.1m (10 feet)
B	trench - 3.1m to 6m inside (10 - 26 feet)
C	covered trench -
D	tunnel - double track HSR mined soft soil
E	tunnel - twin single track <6mi mined soft soil

5100m EIR / EIS Discussion

Socio Economics, Neighborhoods & Environmental Justice:

None -- buried underground

Eminent Domain:

None/ very small -- mostly public land and underground

Land Taking:

None/ very small -- mostly public land and underground (negotiated easement rights only)

Traffic & Mobility:

None -- only at and around station; no road/street closures required; no rebuilding of overpasses or grade separations

Biological Resources & Riparian Corridors:

None – No rail bed, structures, construction, vibration, displacement, mitigation or modifications required. ROW buried well below the Guadalupe River and Los Gatos water ways and riparian corridors. No impact on migratory fish, reptiles, birds, mammals, insects, grasses, plants, habitat, and other

Noise & Vibration:

None -- no surface structures or at grade rail beds in or through historic neighborhoods or densely populated core city areas as ROW is well under ground in areas of greatest concern

Construction Impacts:

Significantly fewer -- only south of Tamien and tunnel entrance; no pile driving; no earth moving equipment; no concrete, steel and materials trucks; no cranes and overhead equipment; no road closures; no construction mitigation issues

Sound Mitigation:

None-to-nil – buried under ground; no sound walls required

Cumulative & Secondary Impacts:

None to nonexistent – Combined HSR, Caltrain & other heavy rail are buried and under ground; simultaneous or cumulative noise and vibration is underground and fully mitigated

Parks Recreation & Open Space:

None taken – Preserves, protects and enhances opportunities for parks, trails and open apace – Preserves, protects and enhances visual, aesthetic value and eliminates sound pollution for same – Reference Scoping input letter from Dr. Laurence Lowell Ames and others

Transportation & Circulation:

Walking and Bike Trails – No mitigation require – HSR, Caltrain & other passenger and light freight heavy rail is underground providing increased opportunity for greater carbon free mobility within and about the city... for work related commuting, general mobility and recreation and health maintenance – See Scoping letter from Dr. Larry Ames

Auto & Public transportation – No mitigation required – HSR, Caltrain, Amtrak, ACE and UPRR rail can follow this alignment underground through San Jose

Local Growth:

No Impact – Track ROW and associated space and imposition considerations are non-existent – buried under ground

Station Planning:

No to little impact -- 5100m is an underground option that offers greater architectural freedom in planning the new Diridon multi-modal transit mall -- Options for separate bore(s) for through passage are possible.

Land Use & Property:

Little-to-No Impact -- HSR, Caltrain and other heavy rail is buried under ground -- 5100m offers greater degrees of freedom for Land Use planning -- Little to No Impact on Property values due to above ground alignment options

EMI / EMF:

None -- Buried and under ground

Security & Public Safety:

None -- 5100m is buried and underground

Blight, Land Remnants & Misuse:

None – 5100m alignment is buried and underground; No land remnants to provide shelter or opportunity for misuse, unauthorized use or undesired or illegal behavior

Aesthetics & Visual Quality:

No Impact -- 5100m is buried underground -- No supporting structures -- No sound or security barriers -- No visible overhead wires or suspension structures -- No cleaning or aesthetics mitigation or maintenance concerns – No impact of such on perceived or real property values

Hydrology & Water Resources:

None to Little -- See Appendix

Geology & Seismicity:

None to Little -- Current bore designs and construction technology mitigate this issue -- The difficulty of boring 5100m has been referred to by some... " like a hot knife through butter"
See Appendix

5100m Speed Considerations

-- This high speed alignment removes 30 seconds from every HSR train stopping at San Jose, and even more for through trains

-- Larger radii, gentle grade, enhanced security and reduced mitigation allow the highest possible speeds with the least challenges.

-- This proposal reserves the smaller turn radius for entry to the Dirdon station where slower speed is needed for station arrival.

--- April 2009 ---